



An
Coimisiún
Pleanála

Inspector's Report ABP-320010-24

Development	Construction of poultry house and store with all associated site works. Environmental Protection Agency licence required. Natura Impact Statement and Environmental Impact Assessment Report submitted with planning application.
Location	Carrickbaggott, Grangebellew, Co. Louth
Planning Authority	Louth County Council
Planning Authority Reg. Ref.	2460189
Applicant(s)	Crayvall Egg Production Limited
Type of Application	Permission
Planning Authority Decision	Refuse Permission
Type of Appeal	First party
Appellant(s)	Crayvall Egg Production Limited
Observer(s)	Peter Sweetman

Date of Site Inspection

13/10/2025

Inspector

Bébhinn O'Shea

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1.0 Site Location and Description

- 1.1. The site measures 68.5 hectares, consists of several fields, and is located in Carrickbaggot, County Louth immediately south of Grangebellew village. The site, as outlined in red, contains a far greater area than that affected by the development; the application states that this is due to the existing poultry house on the site and for the purposes of consistency in the EIAR and EPA licence. A railway line and embankment define the east of the site. The site (and surrounding landscape) is undulating, and falls away to the south eastern area where the proposed poultry houses is to be situated. Access is via a large, splayed entrance at the south west of the site from the L2275, along a surfaced driveway. A quarry is present c. 2 km to the south west as the crow flies.
- 1.2. There is an existing poultry house on the site, located centrally. The buildings and concrete yard etc are notably excavated into the land. The main structure measures 167m in length and c. 7m in height, finished in concrete (lower) and cladding (upper) with a concrete apron, and two manure stores adjacent. It is stated in the application that this poultry house accommodates 60,000 birds as a free range farm; the surrounding fields which make up the majority of the site are designated as the range area for these birds.
- 1.3. The site appears to be the location of former Carrickbaggot House, accessed from a secondary access lane further north. There are three recorded monuments within the site.

2.0 Proposed Development

- 2.1. Permission is sought for
 - 1 No. Poultry Layer House c. 160m x 32m x 8.7m (LxWxH) and area of 5171 sqm. Capacity for 64000 birds. Finished floor level @ 60.5m
 - 1 No. Manure/General Purpose store 40m x 15m x 8.3m (LxWxH), and area of 578 sqm
 - 3 No. meal storage bins
 - Soiled water tank.

- Upgraded internal farm laneway, site drainage and storm water attenuation. These include diversion of a drainage channel, two culvert upgrades and a swale or attenuation tank

2.2. It is stated the site is served by an existing well. Stormwater is proposed to the watercourse. Wastewater is stated as 'not applicable'.

It is stated within the EIAR that the proposed house is for barn egg production (as opposed to free range). Part of the site area currently forms part of the existing free range area for the existing poultry house on the farm, which will be revised to accommodate the proposed development.

The development requires an Industrial Emissions (IE) license under part IV of the Environmental Protection Agency(Licensing) Regulations .

2.3. The application is accompanied by an EIAR and NIS (NIS is Appendix to EIAR) . Appendices to the EIAR are as follows:

- Appendix No. 1: Customer Farmland Details
- Appendix No. 2: Site Location Map (1:2,500 & 1:10,560)
- Appendix No. 3: Site Layout (Not to scale)
- Appendix No. 4: Engineers Drawings (Not to scale)
- Appendix No. 5: Environmental Protection Agency – Draft Advice Notes on EIS – Project Type 13
- Appendix No. 6: Location of customer farmlands
- Appendix No. 7: Existing E.P.A. Licence
- Appendix No. 8: Feed Details
- Appendix No. 9: Animal Tissue Disposal
- Appendix No. 10: Local Water Quality Data
- Appendix No. 11: Extracts from Co. Louth Development Plan
- Appendix No. 12: Met Data
- Appendix No. 13: Natura Impact Statement
- Appendix No. 14: Extract from General Soil Map of Ireland.

- Appendix No. 15: Noise Impact Assessment
- Appendix No. 16: European Communities (Welfare of Farmed Animals) Regulations 2010 – S.I. 311 of 2010
- Appendix No. 17: European Union Good Agricultural Practice For Protection Of Waters) Regulations 2022 – S.I. 113 of 2022
- Appendix No. 18: Air Quality Impact Assessment
- Appendix No. 19: Construction Waste Management Plan
- Appendix No. 20 Sub Soil & Hydrological Assessment & Surface Water Management Assessment
- Appendix No. 21 By-Pass Separator Details.

2.4. Detailed cover letter with the application and pre-planning records are noted.

3.0 Planning Authority Decision

3.1. Decision

The Planning Authority refused permission for 2 no. reasons as follows:

1. Due to the inadequacy of the information provided with the application, particularly in relation to the landspreading areas and biosecurity, climate change, ground water, surface water and biodiversity, the Planning Authority is unable to carry out a comprehensive environmental impact assessment of the proposed development as required by legislation, accordingly, to permit the proposed development would be contrary to the proper planning and sustainable development of the area.
2. On the basis of the information provided with the application, particularly in relation to the landspreading areas, climate change, ground water, surface water and biodiversity, the Planning Authority cannot be satisfied that the proposed development individually, or in combination with other plans or projects would not be likely to have a significant effect on European site North-West Irish Sea SPA (No: 004236), or any other European site, in view

of the site's Conservation objectives. In such circumstances the Planning Authority is precluded from granting permission

3.2. Planning Authority Reports

3.2.1. Planning Reports

3.2.1.1. The Planning report considered the proposed development, internal and external referral reports, the planning history of the site, and the relevant national and local policy. It also sets out the following regulations and guidance:

- European Union (National Emission Ceilings) Regulations 2018.SI. No. 232/2018
- European Union (Good Agricultural Practice for Protection of Waters) Regulations 2022 (SI No 113 of 2022)
- Legal Obligations and Good Practice Guidelines for Poultry Farmers, Department of Agriculture, Food and the Marine, 2014
- Commission Implementing Decision (EU) 2017/ 302, 15th February 2017 Establishing best available techniques (BAT) conclusions, under Directive 2010/75/EU of the European Parliament and of the Council, for the intensive rearing of poultry or pigs
- Integrated Pollution Control Licensing, Batneec, Guidance Note for the Poultry Production Sector, EPA 1998
- Commission Regulation (EEC) No 1274/91 introducing detailed rules for implementing Regulation (EEC) No 1907/90 on certain marketing standards for eggs (15th May 1991) (as amended)
- EPA Licence Application Guidance – Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations (2021)

3.2.1.2. Part 1 of the Planning Report considered the EIAR. Concerns were raised in relation to the spreading of poultry manure and soiled water; there was insufficient information on proposals relating to same. Concerns were also in raised in relation

to stormwater disposal to surface water drains; the PA was not satisfied that this disposal would not impact negatively on the quality of surface water. It was noted that the EIAR does not make reference to potential wetland habitats fed by the Morganstown Stream. It was deemed that ground water, surface water and biodiversity had not been adequately considered and that therefore the Planning Authority was not in a position to adequately assess the EIAR. The report states that the matters in JR 2020/556 and JR 2019/184 were considered but that the planning officer did not concur with the applicant's' assertions.

3.2.1.3. Part 2 of the Planning Report considered the AA and concluded that due to uncertainty in the spreading of manure and soiled water the PA could not be satisfied that the proposed development individually or in combination with other plans or projects would not adversely affect the integrity of the European Site North-West Irish Sea SPA in view of the sites Conservation Objectives.

3.2.1.4. Part 3 of the Planning Report contains the general planning assessment and

- Considered the proposed development open for consideration at this location, subject to the development being compatible with the host environment.
- Considered the form and design of the proposed buildings acceptable
- Accepted the need for the poultry house at the location proposed, removed from the existing structure, given the nature of operations.
- In terms of residential amenity, noted that there would be odours from spreading of manure and the ventilation system, that this would occur at particular times but that any EPA licence granted would require monitoring for various aspects.
- Noted, having regard to information within the EIAR, that there was no issue in terms of noise or air (dust) in terms of residential amenity
- Was satisfied that the proposed development would not give rise to unacceptable impact on traffic
- In relation to surface water noted that all surface water from the proposed poultry farm will discharge through the existing/ proposed storm water discharge points to ground/ surface water, but no details of the type of clean or

soiled surface water, pipes or calculations have been submitted to demonstrate compliance with SUDS requirements. Noted the report from Placemaking & Physical Development Section requested further information in relation to the proposed surface water arrangements at the site and a Flood Risk Assessment. As the recommendation was to refuse, this further information was not requested.

- Noted that soiled water produced from the proposed poultry farm was to be directed to storage facilities and that there will be no external movement of stock between houses thus preventing the generation of soiled water outside the houses. The only soiled water will be from the washing of houses and the concrete apron. The report concluded that land spreading is not considered to be a satisfactory proposal in relation to the management of the soiled water.
- In relation to poultry manure intended to be spread, it states that scant details of customer lands have been included in the EIAR, it is not considered to be a satisfactory proposal in relation to the management of the poultry manure.
- Noted water supply proposed from Group Water Scheme
- Concluded that the proposed development was an intensive form of agriculture in a rural area but in policy terms open for consideration in this rural location. However, given the lack of information in relation to landspreading areas, climate change, ground water, surface water and biodiversity in the EIAR & NIS submitted with the application, it was not shown that the proposed development would not have a significant adverse impact on the amenities of the residents living in surrounding area, particularly due to the land spreading of manure and soiled water.

3.2.1.5. The planning report recommended refusal for the reasons set out at 3.1 above.

3.2.2. Other Technical Reports

- Waste and Environment Section: No objection subject to conditions.
- Placemaking and Physical Development Section: Requests Further Information:

- Design and construction of culvert over watercourse
- Engineering summary of the surface water drainage and SUDS elements
- Updated design for piping of the existing drain/stream and diversion
- Confirmation if Section 50 licence is required
- Flood Risk Assessment

3.3. Prescribed Bodies

DoEHGL DAU: Requests Archaeological Impact Assessment by way of Further Information

Irish Rail: Observations: Notes proposed discharge to soakpit/watercourse. Soakpit must be <20m from railway boundary. Flows to watercourse and impact on railway culvert to be determined. Land drain remains exclusively for railway corridor drainage.

An Taisce: - Development proximate to a series of cutover raised peat wetlands of high and moderate local conservation rating (Carrickbaggot, Morganstown, Burren wetlands), impact of ammonia emissions on human health and biodiversity to be considered.

- WFD assessment required having regard to proximity to the Slieveboy stream. Close consideration of manure management plan required

- Cumulative and transboundary effects of ammonia given intensive nature of agriculture in the region must be assessed

3.4. Third Party Observations

None

4.0 Planning History

19231 Permission granted to Crayvall Egg Production Ltd. in September 2019 for 1 no. free range poultry house and 2 no. manure / general purpose stores, together with all ancillary structures, and all associated site works

22480 Permission granted to Crayvall Egg Production Ltd. to install roof mounted solar panels on poultry house.

2360288 Permission refused to Crayvall Egg Production Ltd. For 1 No. Poultry Layer House and 1 No. Manure/General Purpose store, together with all ancillary structures, and all associated site works for the following 3 reasons:

- 1) *Due to the inadequacy of the information provided, particularly in relation to the landspreading areas and biosecurity, alternative sites, noise, dust, climate change, ground water, surface water and biodiversity, the Planning Authority is unable to carry out a comprehensive environmental impact assessment of the proposed development as required by legislation, accordingly to permit the proposed development would be contrary to the proper planning and sustainable development of the area.*
- 2) *On the basis of the information provided with the application and appeal, particularly in relation to the landspreading areas, noise, dust, climate change, ground water, surface water and biodiversity, the Planning Authority cannot be satisfied that the proposed development individually, or in combination with other plans or projects would not be likely to have a significant effect on European site North-West Irish Sea SPA (No: 004236), or any other European site, in view of the site's Conservation Objectives. In such circumstances the Planning Authority is precluded from granting permission.*
- 3) *The proposed development is sited a considerable distance away from and not clustered with the existing poultry house on the farm holding and no business plan setting out the requirement for the development or the potential future development capacity of the farm has been provided to allow for a comprehensive assessment and consideration of the need for the proposal, as provided for in Chapter 13.13.11.7 of the Louth County Development Plan 2021-2027, as varied and the best available techniques (BAT) conclusions, under*

Directive 2010/75/EU of the European Parliament and of the Council, for the intensive rearing of poultry or pigs.

The proposed development would set an undesirable precedent for this type of agricultural development that fails to provide adequate levels of design and justification. Therefore, the proposed development would be contrary to Chapter 13 of the County Development Plan and the proper planning and sustainable development of the area.

5.0 Policy Context

5.1. National

5.1.1. National Planning Framework (1st Revision)

- National Policy Objective 30
- Facilitate the development of the rural economy, in a manner consistent with the national climate objective, through supporting a sustainable and economically efficient agricultural and food sector, together with forestry, fishing and aquaculture, energy and extractive industries, the bio-economy and diversification into alternative on-farm and off-farm activities, while at the same time noting the importance of maintaining and protecting biodiversity and the natural landscape and built heritage which are vital to rural tourism.

5.1.2. Climate Action Plan, 2025

Outlines measures and actions by which the national climate objective of transitioning to a climate resilient, biodiversity rich, environmentally sustainable and climate neutral economy by 2050 is to be achieved. These include the delivery of carbon budgets and reduction of emissions across sectors of the economy, including agriculture.

5.1.3. National Biodiversity Action Plan 2023-2030

Includes five objectives by which the current national biodiversity agenda is to be set and the transformative changes required to ensure nature is valued and protected is delivered. Of relevance to the proposed development, are the targets and actions associated with Objective 2 on achieving the conservation and restoration needs of designated areas. The Commission must have regard to the objectives and targets of the Plan in the performance of its functions.

5.1.4. Foodwise 2025

Food Wise 2025 sets out a ten year plan for the agri-food sector. It sets out the strengths and weakness of the poultry and eggs sector, and the importance of the sector in terms of output and employment. It sets out actions and approaches to provide the best environment and tools to fulfil potential growth opportunities over the coming 10 years.

5.1.5. European Union (Good Agricultural Practice for Protection of Waters) Regulations 2022 S.I. No. 113/2022 (GAP Regulations)

The Regulations provide the relevant standards for the collection and disposal of farm yard manure to give effect to Ireland's Nitrates Action Programme for the protection of waters against pollution caused by agricultural sources. The GAP Regulations addresses issues such as minimum capacity for storage of effluent and soiled water, the duty of the occupier in relation to nutrient management, periods when landspreading is prohibited, minimum distance to wells and rivers, and other such matters.

The GAP Regulations give effect to the Fifth Nitrates Action Plan ("the NAP").

The competent authorities under the Regulations are the EPA in relation to fertiliser used under a licence issued under Part IV of the Environmental Protection Agency Act 1992 (as amended) and the Minister for Agriculture, Food and the Marine in relation to any other fertiliser. The Commission is not a competent authority under the GAP Regulations.

5.1.6. The application and appeal refer to other agricultural regulations and guidance e.g.

- Legal Obligations and Good Practice Guidelines for Poultry Farmers, Department of Agriculture, Food and the Marine, 2014
- European Communities (Welfare of Farmed Animals) Regulations 2010 – S.I. 311 of 2010.

These largely provide context for the operational requirements of the development as incorporated into the planning application.

5.2. Development Plan

5.2.1. The relevant development plan is the Louth County Development Plan 2021-2027 (as varied). The site is unzoned.

5.2.2. The following Policy Objectives are most relevant:

EE 55 To support rural entrepreneurship and rural enterprise development of an appropriate scale at suitable locations in the County.

EE 60 To continue to support the agricultural sector and to facilitate the development of environmentally sustainable agricultural activities.

EE 61 To facilitate the diversification of the agricultural sector by supporting alternative farm enterprises subject to the nature and use of any enterprise being compatible with the environment in which it is located

NBG 20 To protect and enhance wetland sites that have been rated A (International), B (National), C+ (County), C and D importance in the Louth Wetland Surveys and any subsequent versions thereof.

ENV 15 To implement the recommendations contained in the River Basin District Management Plans for Ireland 2018-2021 or any subsequent plan. Proposed plans, programmes and projects shall not have an unacceptable impact on the water environment, including surface waters, groundwater quality and quantity, river corridors and associated woodlands. Also, to have cognisance of, where relevant,

the EU's Common Implementation Strategy Guidance Document No. 20 and 36 which provide guidance on exemptions to the environmental objectives of the Water Framework Directive.

ENV 20 To ensure compliance with and to implement the provisions of the Nitrates Directive in so far as it falls within the remit of the Council to do so.

ENV 21 is To assess agricultural developments and associated agricultural waste matters within the County in accordance with the European Union (Good Agricultural Practice for Protection of Waters) Regulations 2017 for the purpose of preventing or eliminating the entry of polluting matters to waters

5.2.3. Development Management:

13.13.11.7 Agricultural Enterprises and Buildings

This section sets out development management considerations, including

- Each application will be assessed on its individual merit and will take account of the ability of the local landscape to absorb the development, the capacity of the local infrastructure (including roads, water and waste water infrastructure) traffic movements and amenities of residents living in the vicinity of the development.
- A business plan may be required.
- New buildings shall be designed to maximise efficiency, address any pollution control requirements, provide additional feed and machinery storage areas, and improve livestock welfare.
- New buildings shall be positioned and designed so they are as unobtrusive as possible, given attention to the sensitivity of the landscape and clustering with existing buildings where possible.
- Finishes to buildings will normally include rendered/block walls and dark coloured panels to the side and roof of buildings such as dark green, red, or grey. Landscaping to assist in the integration of new buildings into the landscape.

- Details required of how any effluent/run-off associated with the development will be collected and stored

5.3. Natural Heritage Designations

5.3.1. Dundalk Bay SAC c. 8km to north of site

Clogher Head SAC c.7km to east of site

Boyne Coast and Estuary c.7.5km to south east of site

Dundalk Bay SPA c. 8km to north of site

North-west Irish Sea SPA c.4.6km to east of site

Boyne Estuary SPA c. 9km south of site

Stabann-Braganstown SPA c. 11.2 km northwest of site

5.3.2. Barmeath Woods pNHA c. 1.7km to north of site

Blackhall Woods pNHA c. 1.7km to south-east of site

5.3.3. Carrickbaggot Wetland, identified in Louth Wetland Survey as being of national importance, partly within the site to north east. See Appendix 4 to this report.

5.3.4. As per Map 8.5 Landscape Character Areas of the LCDP, the site is within the Muirhevna Plan, identified as being of local importance and identified for its flat undulating features drained by the meandering rivers. The Landscape Character Assessment (2002) elaborates on the classification, sensitivities, key values and objectives of each area.

5.4. Built Heritage

5.4.1. The entrance gates, walls and rails to Rokeby Hall (a Protected Structure RPS No: LHs018-019 along with its stableyard RPS No: LHs018-019) are located on the opposite side of the road to the entrance to the development, c. 90m south west.

Rockeby Hall gate lodge RPS No: LHs018-035 Marlay House and LHs018-036, also associated with Rockeby Hall, are also c. 1km to the northwest. All of the above are listed on the NIAH

5.4.2. Rokeby Hall is also designated as “Historic Gardens and Designed Landscape” as provided for in Table 9.5 in Section 9.7 of the LCDP. The NHBS describes this as:

Once fine demesne, retains original layout for important late 18th century house. House on high ground surrounded by a belt of trees, with vistas from the house to north and southeast over parkland. Shelter belts formerly surrounded the property. Large ornamental ponds with islands to northeast. In the mid-19th century there were highly ornamental gardens south, east and west of the house, presumably complementing the Turner conservatory. By 1908 the OS revision shows the area reduced to walks and probably shrubbery and an aviary is noted. None of this remains. In multiple occupancy since 1970s. Land intensively farmed.

5.4.3. There are three recorded monuments within the site:

LH018-046001- Church/Chapel in Ruins and LH018-046002- Graveyard - grouped together towards the north-east of the site c. 550m from the location of the proposed poultry house.

LH0198-47 – Holy well is located in the south central portion of the site, c. 400m from the location of the proposed poultry house.

6.0 The Appeal

6.1. The appeal sets out the background of the case, planning history, planning policy and legislative framework. It highlights initially that

- animal manure is a source of fertiliser; a by-product and not waste, and that this is supported by decisions of the European Court of Justice.
- under the Animal ByProducts Regulations 2014, poultry waste is a Category 2 material, controlled under Article 2, which sets out that transport of manure between two points on a farm or between farms requires authorisation.

- The European Union (Good Agricultural Practice for Protection of Waters) Regulations 2022 S.I. No. 113/2022 is relevant to this case. Definitions/content from same is quoted.

6.2. **Grounds of Appeal**

I have summarized the grounds of appeal as follows:

- 6.2.1. The decision of the planning authority is unreasonable given there are already legal controls in place for the land-spreading, storage, handling, management and land spreading of animal manure.

The legal controls in respect of the application of organic fertilizer are the Nitrates Regulations SI 113 of 2022 and Animal By-Products 2014, monitored and controlled by the DAFM. The applicant has a proven track record of operating in compliance with regulations.

Poultry manure and washwater are not emissions or waste, as set out by law. There is no intention of discarding this material. The EIAR identifies farmers with a need for this fertilizer. They are entitled to use it, in compliance with SI 113 of 2022.

The decision of the planning authority ignores the fact that the application of animal manure is an existing approved practice, carried out in accordance with the GAP regulations and will take place irrespective of any decision to grant planning permission for the development.

Planning permission is not required for the application of organic fertilizer by landspreading. The custodians of lands subject to land spreading are not party to the application or any conditions of planning permission that may be imposed.

Section 24 (13) of the Planning Act applies in this instance - this element is beyond the control of the planning system.

The EPA license takes precedence and the planning authority are precluded from applying environmental conditions on an activity requiring an EPA license.

- 6.2.2. The appellant considers groundwater, surface water and biodiversity are adequately considered in the EIAR in relation to potential impact on designated EU sites.

The Planning Authority did not set out any contradictory scientific evidence to explain why they could not carry out an EIA.

The EIAR identified that certain customer farmers have a need for fertilizer, and SI 111 of 2022 would apply. Soiled water arrangements are set out on p 68 of the EIAR, and page 84.

The project the subject of this planning application is the extent of the project for the purpose of the EIA directive and does not include land spreading of third party lands which are more remote and already controlled by separate measures.

The EIAR reflects an understanding of the legal situation that is not within the planning report.

6.2.3. The proposed development is not within a European Site. There are no surface water pathways providing connections to same. The risk to groundwater from accidental spillage or emissions is minimal. There is no pathway between the manure house and surface water. Washwater be used outside of the site as fertilizer in accordance with the Nitrates Regulations. Nitrates Regulations set out practices for land spreading including timing and separation distance from water bodies.

6.2.4. The planning authority failed to have regard to the statutory provisions in place and the planning report did not consider recent relevant judgments and precedent cases:

- The High Court Judgement IEHC55 (Peter Sweetman v EPA & Ors) JR2019/184 which although in respect of an EPA licence, has relevant legal considerations. The judgment makes it clear that poultry litter and washwater are not waste. The appellant concurs with the views of the EPA in that case, that the decision of the planning authority should not extend to off-site landspreading of manure and washwater - other than the application demonstrating that it can be dealt with in accordance with relevant regulations. The judgement confirmed that land spreading activities affecting European sites are protected by other legislation.
- High Court and Supreme Court cases An Taisce v An Bord Pleanála & Ors in relation to the construction of a cheese factory by Kilkenny Cheese Ltd.

(formerly JHOK Ltd.) JR 2020/566 Kilkenny The ABP inspector in the case of the Kilkenny Cheese case stated that it would not be possible to assess the general effects of milk production on all Natura 2000 sites but that it can be concluded in general terms that the continued implementation of programmes and mitigation measures will mitigate potential indirect effects. In JR 2020/566 (judgement 2021 IEHC 254) the High Court– held that the indirect effects of milk production were too remote and sufficiently removed from the development to be assessed in site specific terms, therefore it is not considered part of the development for the purposes of EAI or AA. This decision was upheld by the Supreme Court [2022] IESC 8. This is relevant to the determination of the subject appeal.

- The appeal refers to precedent in ABP Ref 308942 Biogas Plant in Galway where the inspector concluded that the identification, assessment and control of landspreading of digestate was not feasible in the context of the application.

6.2.5. Copies of European and Irish judgements, Statutory Instruments and ABP inspectors' reports are included and noted.

6.3. Planning Authority Response

The Planning Authority notes appeal reference to High Court Judgement Peter Sweetman v EPA [2-24] IEHC55 and understands it has been progressed to the Supreme Court for consideration. All other matters are considered to be addressed in the planner's reports. Urges the Board to uphold the decision.

6.4. Observations

- Peter Sweetman/Wild Irish Defence:
 - States no NIS was submitted with the application.
 - States the Planning Authority did not carry out an Appropriate Assessment.
 - Sets out the Commission's legal responsibilities under three areas of legislation and notes in particular.

- Under the Planning Acts the Commission must examine whether the application meets Article 23 and 23 of the Planning Regulations and assess its planning merits.
- Under the EIA Directive the Commission must examine the EIAR particularly with regard to Article 4(4) of the directive, and form a view as to the environmental impacts of the development
- Under the Habitats Directive, the Commission must screen the development under Article 6.3 and make a decision. The submission quotes case law to support its contention that the possibility of there being a significant effect will generate the need for an appropriate assessment. Based on the lack of certainty in the information submitted it is not possible for the Commission to make decision to grant permission; as an assessment cannot have lacunae and must contain complete, precise and definitive findings and conclusions capable of removing all scientific doubt as to the effects of the works on the sites concerned.
- The ‘application to land’ of ‘fertiliser’, i.e. the landspreading of slurry, is regulated by the Good Agricultural Practice for Protection of Waters Regulations [the GAP Regulations]. This is enforced by local authorities and the Environmental Protection Agency. The Department of Agriculture, Food and Marine oversee the implementation of the Regulations, which form part of the Fifth Nitrates Action Programme.

6.5. Further Responses

None

7.0 Environmental Impact Assessment

7.1. Statutory Provisions

- 7.1.1. Schedule 5, Part 1, Class 17, requires EIA for installations for the intensive rearing of poultry with more than 60,000 places for hens. There is capacity for 60,000 hens in the existing house and capacity for 64,000 additional now proposed. The proposed development therefore requires EIA.

7.2. EIA Structure

- 7.2.1. This section of the report comprises the environmental impact assessment of the proposed development in accordance with Planning and Development Act 2000 (as amended) and the associated Regulations, which incorporate the European directives on environmental impact assessment (Directive 2011/92/EU as amended by 2014/52/EU). Section 171 of the Planning and Development Act, 2000 (as amended) defines EIA as:
- (a) consisting of the preparation of an EIAR by the applicant, the carrying out of consultations, the examination of the EIAR and relevant supplementary information by the Board, the reasoned conclusions of the Board and the integration of the reasoned conclusion into the decision of the Board, and
 - (b) includes an examination, analysis and evaluation, by the Commission that identifies, describes and assesses the likely direct and indirect significant effects of the proposed development on defined environmental parameters and the interaction of these factors, and which includes significant effects arising from the vulnerability of the project to risks of major accidents and/or disasters.
- 7.2.2. Article 94 of the Planning and Development Regulations, 2001 and associated Schedule 6 set out requirements on the contents of an EIAR.
- 7.2.3. This EIA section of the report is therefore divided into two sections. The first section assesses compliance with the requirements of Article 94 and Schedule 6 of the Regulations. The second section provides an examination, analysis and evaluation

of the development and an assessment of the likely direct and indirect significant effects of it on the following defined environmental parameters, having regard to the EIAR and relevant supplementary information:

- population and human health,
- biodiversity, with particular attention to species and habitats protected under the Habitats Directive and the Birds Directive,
- land, soil, water, air and climate,
- material assets, cultural heritage and the landscape,
- the interaction between the above factors, and
- the vulnerability of the proposed development to risks of major accidents and/or disasters.

7.2.4. The assessment provides a reasoned conclusion and allows for integration of the reasoned conclusions into the Commission's decision, should they agree with the recommendation made.

7.3. Issues raised in respect of EIA

7.3.1. Permission was refused by Louth County Council as the Planning Authority contended it was unable to carry out a comprehensive environmental impact assessment of the proposed due to the inadequacy of the information provided with the application, particularly in relation to the landspreading areas and biosecurity, climate change, ground water, surface water and biodiversity.

7.4. Compliance with the Requirements of Article 94 and Schedule 6 of the Regulations 2001

7.4.1. Compliance with the requirements of Article 94 and Schedule 6 of the Regulations is assessed below.

Article 94 (a) Information to be contained in an EIAR (Schedule 6, paragraph 1)

A description of the proposed development comprising information on the site, design, size and other relevant features of the proposed development (including the additional information referred to under section 94(b)).

A description of the proposed development is contained in Chapter 3 of the EIAR. This includes details on the location of the site, the scale of development and existing operations on the site including range area. It sets out the and the operation of the poultry farm in terms of subdivision of colonies within, stocking cycle and production processes, along with details of the housing, its heating and ventilation, and use of natural resources, focussed on water supply and waste/byproduct. The chapter sets out a context for the development of a move from existing housing systems to high welfare systems and the requirement of various agricultural schemes which must be complied with. There is very limited description of the construction aspect of the development, some information is available in the noise impact assessment and construction and waste management plan.

A description of the likely significant effects on the environment of the proposed development (including the additional information referred to under section 94(b)).

The EIAR envisages that no aspects of the environment will be significantly affected by this proposed development. Chapter 7 sets out aspects of the environment which may potentially significantly affected, along with inter-relationship between EIA factors in Chapter 8. There is little consideration of the construction phase other than waste management and traffic in section 7.8. A substantial amount of detail is contained within appendices to the EIAR rather than integrated into the main body of the report.

A description of the features, if any, of the proposed development and the measures, if any, envisaged to avoid, prevent or reduce and, if possible, offset likely significant adverse effects on the environment of the development (including the additional information referred to under section 94(b)).

Section 4.10 briefly sets out best practice and mitigation measures in this regard. Mitigation is also referenced in Chapter 7 and Chapter 8 of the EIAR, and within the Environmental Management Programme within Chapter 9. Various mitigation aspects are set out within Appendices to the EIAR, and there is a large reliance on

requirement of regulations. There is no consolidated detail of specific mitigation measures.

A description of the reasonable alternatives studied by the person or persons who prepared the EIAR, which are relevant to the proposed development and its specific characteristics, and an indication of the main reasons for the option chosen, taking into account the effects of the proposed development on the environment (including the additional information referred to under section 94(b)).

A description of the alternatives considered is contained in Chapter 5 of the EIAR and considered in more detail in Section 7.5 of my report. I am satisfied that the applicant has studied reasonable alternatives in assessing the proposed development and has outlined the main reasons for opting for the current proposal before the Commission and in doing so the applicant has taken into account the potential impacts on the environment.

Article 94(b) Additional information, relevant to the specific characteristics of the development and to the environmental features likely to be affected (Schedule 6, Paragraph 2).

A description of the baseline environment and likely evolution in the absence of the development.

This is included in Chapter 6 of the EIAR. I consider that there are gaps in the baseline environment description in relation to biodiversity and groundwater extraction. I refer the Commission to discussion under Section 7.6.7 Water in this regard.

A description of the forecasting methods or evidence used to identify and assess the significant effects on the environment, including details of difficulties (for example technical deficiencies or lack of knowledge) encountered compiling the required information, and the main uncertainties involved

Information was extrapolated from the existing poultry house operations, and using parameters defined in regulations and based on publications listed in Section 2.8. These are referenced throughout the EIAR. Section 4.13 sets out that there were no difficulties encountered in compiling the required information. I consider there are some gaps in details relating to noise impact forecasting however I consider these

can be overcome; this is addressed later in my report. There are also some discrepancies between the Air Quality Impact Assessment Table 22 and Natura Impact Assessment Table 5 in terms of background nitrogen levels at European sites however I have addressed this in my report.

A description of the expected significant adverse effects on the environment of the proposed development deriving from its vulnerability to risks of major accidents and/or disasters which are relevant to it.

This is addressed briefly in Chapter 1 section 1.17 page 21; the potential risk to human health /cultural heritage and/or the environment due to accidents and/or disasters is considered limited. While addressed briefly, I consider this reasonable.

Article 94 (c) A summary of the information in non-technical language.

This information has been submitted as Chapter 1 of the EIAR. I am satisfied that the document is concise and is written in a language that is easily understood by a lay member of the public.

Article 94 (d) Sources used for the description and the assessments used in the report

Chapter 2 of the EIAR sets out the sources used for the description and assessments. Other sources are referenced throughout the document.

Article 94 (e) A list of the experts who contributed to the preparation of the report

Section 2.7 sets out the EIA team members and lists organisations and bodies consulted directly/indirectly, including individuals who prepared the reports within Appendices (e.g. NIS, Noise Survey) . The names of some experts listed in Section 2.7 do not all correspond with the names of those who prepared appendix documents (e.g. Air Quality Impact Assessment) . Individual qualifications, competencies and specific contributions to the EIAR are not clearly set out. This section is lacking in evidence that the EIAR has been prepared by experts with competency in all technical subject areas and in particular in assessing the interactions between factors, in particular water (groundwater quantity) and material assets (water supply) and water (groundwater quantity) and biodiversity (wetlands).

7.4.2. Consultations

The application has been submitted in accordance with the requirements of the Planning and Development Act 2000 (as amended) and the Planning and Development Regulations 2001 (as amended) in respect of public notices. No third party submissions to the application were received. Submissions were received from statutory bodies. One observation on the appeal was received. Submissions and observations are considered in this report, in advance of decision making. The appeal was referred to the Environmental Protection Agency, in accordance with Section 87 of the Environmental Protection Agency Act 1992. No submission was received. I am satisfied therefore, that appropriate consultations have been carried out and that third parties have had the opportunity to comment on the proposed development advance of decision making.

7.4.3. Compliance

Having regard to the foregoing, while noting some weaknesses as described further below, I am satisfied that the information contained in the EIAR, and supplementary information provided by the developer is generally sufficient overall to comply with article 94 of the Planning and Development Regulations, 2001. Matters of detail are considered in my assessment of likely significant effects below.

7.5. Examination of Alternatives

- 7.5.1. No issues were raised in the application or appeal in relation to alternatives; the Planning Authority considered that on balance the applicant has adequately considered alternative sites. A description of the alternatives considered is contained in Chapter 5 of the EIAR. The alternatives considered are stated to be site selection, alternative layout and design, alternative size, alternative processes and alternative management of by-product.
- 7.5.2. The site was selected as it is in ownership of the applicant with an existing operation in place, and co-location here offers proximity to the existing packing process, proximity to the market and proximity to tillage farmers intended to receive manure. Being associated with the existing development would also minimise traffic movements. Other sites within the landholding were considered but discounted as

the required separation distances from the existing poultry house could not be achieved and the proposed location is preferable in terms of reduced visual impact. Greenfield sites and purchase of existing sites are referenced but deemed not as advantageous as the site proposed due to ownership and proximities referred to above. I consider this reasonable.

- 7.5.3. Alternative layout and designs are referred to in Section 5.2 of the EIAR. While no alternatives are detailed, the narrative sets out that the layout and design respond to market demands (for barn eggs) and is determined by a requirement to comply with EU BAT (best available technology) requirements for the intensive rearing of poultry, and requirements of the Department of Agriculture, Food and The Marine, requirements of Bord Bia, and supermarket/consumer demand. I accept that these sectoral requirements limit alternatives.
- 7.5.4. Alternative processes are also referred to. However, the applicant already operates an alternative process (free range birds in the existing structure) and market demand and the phasing out of cage systems is creating demand for barn eggs which the development is intended to address. The alternative of broiler/poultry meat production was discounted as it fails to address the applicant's fundamental requirement for barn egg production.
- 7.5.5. I note that the applicant has not set out consideration of the 'do nothing' scenario. However, the EIAR references a lack of ability, without the development, to address market demand for barn eggs, and continued loss of market to imported product, with related environmental impact in terms of sustainability, transport etc. along with increased reliance on chemical fertilizer. I consider there is sufficient information in the EIAR to draw conclusions on this matter.
- 7.5.6. I am satisfied, therefore, that the applicant has studied reasonable alternatives in assessing the proposed development and has outlined the main reasons for opting for the current proposal before the Commission and in doing so the applicant has taken into account the potential impacts on the environment.

7.6. Assessment of Likely Significant Effects

7.6.1. This section of the report sets out an assessment of the likely environmental effects of the proposed development under the following headings, as set out Section 171A of the Planning and Development Act 2000, as amended:

- Population and human health.
- Biodiversity, with particular attention to the species and habitats protected under the Habitats and Birds Directives (Directive 92/43/EEC and Directive 2009/147/EC respectively).
- Land, soil, water, air and climate.
- Material assets, cultural heritage and the landscape.
- The interaction between these factors.
- The vulnerability of the proposed development to risks of major accidents and/or disasters.

7.6.2. In accordance with section 171A of the Act, which defines EIA, this assessment includes an examination, analysis and evaluation of the application documents, including the EIAR and submissions received, and identifies, describes and assesses the likely direct and indirect significant effects (including cumulative effects) of the development on these environmental parameters and the interaction of these. Each topic section is therefore structured around the following headings:

- Issues raised in the appeal/application.
- Examination of the EIAR.
- Analysis, Evaluation and Assessment: Direct and indirect effects.
- Conclusion: Direct and indirect effects.

7.6.3. Population and human health

7.6.3.1. Issues Raised

No issues were raised in the application or appeal in relation to population and human health.

7.6.3.2. Examination of the EIAR.

This matter is addressed briefly in Section 2.9 of the EIAR along with Sections 6.11 and 7.11. The EIAR describes the importance of agriculture to the county's economy and as a source of employment, and the need for the sector to adapt to current challenges. It states that eggs are an excellent source of animal based protein with a lower carbon footprint than meats.

Section 7.11 states that the development will create direct agricultural employment for 2-4 people with indirect employment for building contractors, nutritionists, vets, hauliers and sales personnel. It will provide a source of rural employment. Section 2.9 identifies a Moderate Positive Potential Impact during construction and operational phases. On the matter of emissions to air (ammonia/odour) and noise, examined in more detail in Section 6.6.5 below, the EIAR concludes that the predicted impact of each pollutant is within the appropriate limit/ threshold level.

7.6.3.3. Analysis, Evaluation, and Assessment: Direct and Indirect Effects

I have examined the relevant content in relation to population and human health. I note in particular the assessment of emissions to air examined at Section 7.6.8 of this report below in this regard and I also note the lack of submission of a Construction and Environmental Management Plan (CEMP) , in terms of managing/mitigating impact from construction on local population. The proposed development will be subject to an EPA licence governing emissions. I am satisfied overall that direct and indirect effects on population and human health have been assessed to an adequate degree.

7.6.3.4. Conclusion Direct and Indirect Effects.

I am satisfied that subject to the agreement of a final CEMP with the PA there is no potential for any significant direct, indirect or cumulative effects on population and human health as a result of the proposed development.

7.6.4. Biodiversity (with particular attention to the species and habitats protected under the Habitats and Birds Directives).

7.6.4.1. Issues Raised

The refusal of the planning authority deemed information with the application (in relation to the landspreading areas, ground water, surface water and biodiversity) insufficient for EIA and insufficient to satisfy the PA that there would not be a significant effect on European Sites. This relates primarily to landspreading. In addition, the Planning Authority report remarks on wetlands of high and moderate local conservation rating identified in the County Louth Wetland Survey. These are raised in a submission by an Taisce and reference is made to the impact on same as being a reason for refusal in the body of the Local Authority planning report.

7.6.4.2. Examination of the EIAR.

7.6.4.2.1. Context:

Biodiversity is dealt with in Section 6.9/6.10 and Section 7.9/7.10 of the EIAR. A Natura Impact Assessment accompanies the application in Appendix 13 and an Air Quality Impact Assessment in Appendix 15 and are referred to.

7.6.4.2.2. Baseline

Section 6.9 of the EIAR states the site area and majority of the land in the surrounding area is used for grass/arable-based agricultural production, the flora and fauna associated with this site has developed accordingly as the site has been managed over the years. It states that there are no specific unique habitats, flora and/or fauna on this site that require specific protection.

The EIAR refers to Fig. 6.10 of the County Development Plan for details on heritage areas and important habitats. Policy and mapped features in relation to Green Infrastructure Network in the LCDP is also referenced. The LCDP is referenced for details on heritage areas and important habitats, including NHAs, SPAs, SACs, none of which directly affect the site.

The EIAR identifies 10 European sites within 15km of the proposed development. The AQIA sets out that the zone of impact of the development does not extend beyond 7.5km and that 5 European sites are within this zone.

The EIAR also refers to the proposed customer farmlands where landspreading of manure from the proposed development will take place and that these will be typical Co. Louth agricultural land with associated flora and fauna.

7.6.4.2.3. Potential Effects

Section 7.9 of the EIAR states that the proposed development will require minimal hedgerow removal to facilitate the site development works and no significant habitats will be directly impacted. I note page 222 identifies potential impacts on biodiversity from potential eutrophication from storm water discharge.

Reference is made to the AQIA and NIS, which considers 5 European Sites within the zone of influence of the development. Potential effects from construction impacts (siltation, hydrocarbons etc) and also from ammonia emissions and nitrogen deposition during operation are identified.

The EIAR identifies potential indirect impacts on wider water quality from inappropriate application of fertiliser (landspreading) generated by the proposed development, on customer farmlands.

7.6.4.2.4. Mitigation

No direct effects on biodiversity within the site are identified therefore no mitigation is proposed. In relation to potential pollution from storm water discharge the EIAR concludes with reference to the NIS that there will be no significant effect on European Sites, and therefore no mitigation of operational effects of nitrogen or ammonia are proposed.

7.6.4.2.5. Residual Effects.

The EIAR identifies a slight residual (negative?) impact in terms of biodiversity (eutrophication) and none in relation to habitats (See Table p. 222).

7.6.4.3. Analysis, Evaluation, and Assessment: Direct and Indirect Effects

I note initially that it is not evident that this part of the EIAR has been prepared by an individual with expertise in the area of biodiversity/ecology and that the baseline set out has gaps. There is no reference to an ecological survey of the site having been carried out, and while an in-depth survey and full Ecological Impact Assessment would be disproportionate given the open arable characteristics of the site and minor field boundaries, the ecological assessment of the site, beyond its relationship with European Sites, is largely paper based and not site focussed.

The EIAR does not reference wetlands in the vicinity of the site (partly within) - see Appendix 4 attached to this report showing location of Carrickbaggot wetland. The County Louth Wetland Survey, referenced in Policy Objective NBG20 of the LCDP, refers to protection and enhancement wetland sites that have been rated A (International), B (National), C+ (County), C and D importance in the Louth Wetland Surveys and any subsequent versions thereof.

The 2014 Louth Wetland Survey III completed the 3 year project undertaken by Wetland Surveys Ireland in 2011, 2012 and 2014 to map and characterise all wetlands in the county. It describes Carrickbaggot (Site code MIW_LH103) as a B Rating: Nationally Important; *Reed swamp, transition mire, wetgrassland - A large extensive reedbed which grades from wet grassland to transition mire to reed swamp. The site is relatively intact. Sedge (Carex disticha) dominates along the margins of the transition mire. The site is impounded by a railway line to the west.*

This wetland, along with (Morganstown and Burren) are referenced in a submission by an Taisce. Reference is made to the impact on same as being a reason for refusal in the body of the Local Authority planning report. Having regard to their location and nearby water courses I do not consider that the proposed development is likely to have significant impacts on Morganstown and Burren wetlands. However, I note that the Carrickbaggot wetland is partly within the development site (as outlined in red) and a watercourse runs along the northern boundary of the site, eastward along the northern boundary of this wetland. Streamflow depletion to these wetlands (from possible interception of the flow to streams by groundwater extraction) is a consideration and not referenced in the EIAR. In the absence of

information relating to location of boreholes and quantity/significance of abstraction, the impact on same cannot be assessed. (see also section xx below)

In relation to biodiversity and European Sites, please refer to Section 10 and Appendix 1 and 2. While I have concluded that adverse effects on site integrity of European Sites can be excluded for four such sites within the zone of influence of the development, having regard to the results of the modelling undertaken in the submitted Air Quality Impact Assessment, I am unable to conclude in view of the conservation objectives of Clogher Head SAC that no reasonable scientific doubt remains as to the absence of such effects from ammonia emissions. No mitigation is proposed in relation to ammonia emissions.

Other than the wetlands and European Site referred to above, I am otherwise satisfied that there is no significant residual risk to biodiversity from construction and operational activities.

7.6.4.4. Conclusion Direct and Indirect Effects.

Based on the information submitted in the application and EIAR, I am not satisfied that the EIAR has adequately considered habitats in the vicinity of the site, i.e. Carrickbaggot wetlands, and the possibility of direct and indirect effects on same. Streamflow depletion to these wetlands (from possible interception of the flow to streams by groundwater extraction) and effects on recharge are considerations and not referenced in the EIAR. Furthermore, adverse effects from ammonia emissions on Clogher Head SAC have not been ruled out. Therefore I am not satisfied that there is no potential for any significant direct, indirect or cumulative effects on biodiversity as a result of the proposed development.

7.6.5. Land/soil

7.6.5.1. Issues Raised

No issue was raised in the application or appeal in relation to land and soils (hydrology of soils being considered under 'water' below).

7.6.5.2. Examination of the EIAR.

Land/soil is dealt with in Section 6.1 and 7.1 of the EIAR. The EIAR notes the geology of the site as the Clogherhead Formation, which consists of thickly bedded calcareous greywacke, and that there is a mix of soil types in the area, with poorly draining lacustrine-type soils at the location of the proposed henhouse.

The EIAR states at section 7.1 that the proposed development will have a significant effect on the soil in the development area, given the nature of the site and the proposed works. This statement is not elaborated upon except that the site will require excavation and levelling for the proposed development, with a significant proportion of the excavated soil to be used for site amelioration works, and that this has been detailed in Section 6.1. It is stated that the finished floor level has been detailed so as to average out the ground levels on the site that all of the soil/subsoil can be accommodated and utilised within the site, while at the same time ensuring that the proposed development is integrated into the landscape.

7.6.5.3. Analysis, Evaluation, and Assessment: Direct and Indirect Effects

The land take for the proposed poultry house, though not stated within the main body of the EIAR appears to be approximately 1.5 hectares. The FFL proposed is 60.5, the majority of the building footprint is within the 61m contour. I do not consider the land take, or the or level of excavation/ interruption to the soil profile, or the extent of potential compaction/sealing arising from same to be significant in the context of the open rural area.

The EIAR also refers to customer lands on which manure will be spread. These lands are beyond the scope of the project, for the purposes of EIAR. This is elaborated upon in Section 7.6.7.3, below.

7.6.5.4. Conclusion Direct and Indirect Effects.

I am satisfied that there is no potential for any significant direct, indirect or cumulative effects on land and soil as a result of the proposed development.

7.6.6. Water

7.6.6.1. Issues Raised

The refusal of the planning authority was substantially related to water, deeming information with the application (in relation to the landspreading areas, ground water, surface water and biodiversity) insufficient for EIA and insufficient to satisfy the PA that there would not be a significant effect on European Sites. I note the following comments within the Local Authority planning report, as context for the assessment that follows.

- There would be minimal infiltration of soiled water from the proposed poultry houses
- The proposed poultry houses will be constructed on an impermeable concrete base which will limit the potential for infiltration of soiled waters into the ground,
- It is not clear how frequent the washing of the house will occur or what the quantum of soiled water will be.
- Based on the Legal Obligations and Good Practice Guidelines for Poultry Farmers, Department of Agriculture, Food and the Marine, 2014, water used for cleaning poultry houses should not be spread on land used for grazing livestock or on land adjacent to water courses or to grazing animals.
- The planning officer was not satisfied that the disposal of storm water/ surface water from the development would not impact negatively on the quality of surface water.
- Landspreading on applicant's adjoining/ adjacent lands as per Section 1.15 of the EIAR has not been demonstrated not to present a potential risk to water quality.
- Only scant details of customer farmlands have been included in Appendices 1 & 6 of the EIAR, and in any case this is not considered to be a satisfactory proposal in relation to the disposal of any soiled water.

- The EIAR makes no reference to any potential wetland habitats that may be impacted by the proposed development, so this should be included in the reasons for refusal.
- Flood risk assessment requested by internal department
- Further clarity and information required “in relation to surface water proposals, watercourses, drains, wells, ditches, the type of birds to be housed, effluent storage, quantum of soil water produced, overall stocking rate on the premises, calculations, etc.”

Consideration of the above is included in the following sections.

7.6.6.2. Examination of the EIAR.

7.6.6.2.1. **Context**

Surface water and groundwater are dealt with in Section 6.2/6.3 and 7.2/7.3 of the EIAR. Appendix 10 and Appendix 20 is a Sub Soil & Hydrological Assessment & Surface Water Management Assessment prepared with reference to the Greater Dublin Strategic Drainage Study (GDSDS) recommendations. Water supply is referenced in Section 7.6.11.2 in terms of material assets.

7.6.6.2.2. **Baseline**

In relation to surface water, Section 6.3 of the EIAR sets out that the site is within the Burren sub-catchment area; there are open drains within the landholding, likely to flow towards the Morganstown Stream, which is 300m north of the development site. This stream flows east until it flows into the sea near Lurganboy, approximately 5.1km north-east of the application site.

In relation to groundwater Section 6.3 of the EIAR states the site is located over a Poor Aquifer (Pu), with a Moderate vulnerability. Appendix 20 of the EIAR sets out that the site does not have potential for infiltration.

There is no history of flooding on or close to the development site.

7.6.6.2.3. **Potential Effects**

The proposed development will involve the creation of additional hardstanding area, and the piping/re-direction of a section of field drain at the location of the proposed building. These have the potential to effect surface water flow. These are detailed within Appendix 20 Sub Soil & Hydrological Assessment & Surface Water Management Assessment.

There is potential for discharge of pollutants to surface and ground water during construction and during operation from landspreading (in the vicinity of the site and removed from same) and inappropriate disposal of soiled water. These could negatively affect surface water quality.

7.6.6.2.4. **Mitigation**

A high quality development and storm water discharge design are identified as mitigation for any surface water pollution and flooding, as per Appendix 20 of the EIA. In relation to landspreading, the GAP regulations are referenced as mitigation. Best practice construction methods will mitigate impacts from construction stages. These are described on p 169 onwards of the EIA along with 35 onwards of the NIS. No other mitigation is identified in relation to groundwater quantity.

7.6.6.2.5. **Residual Effects.**

The EIA identifies a slight residual (negative) impact in terms of water (See Table p. 222).

7.6.6.3. Analysis, Evaluation, and Assessment: Direct and Indirect Effects

Surface Water:

7.6.6.3.1. In terms of surface water quality, construction/operational impacts e.g. siltation, hydrocarbon spillage, have been considered under the Water Framework Screening attached to this report, and under Biodiversity above and within the Appropriate Assessment attached. I do not intend to repeat same. Mitigation through

best practice construction methods is proposed. Please note Water Framework Directive Screening in Appendix 3 to this report setting out the relevant surface and ground waterbodies and their status and risk under the WFD.

7.6.6.3.2. There is no history of flooding on or close to the development site. I note the site is not within a location with probability of fluvial flooding, being well outside Flood Zone A and B as per CFRAMs mapping, and removed from high end predicted scenario for fluvial flood extent. Notwithstanding commentary in the EIAR, mapping indicates that the surface water network / drains at the development site flow east and the north along an under the railway toward Carrickbaggot.

7.6.6.3.3. Landspreading of manure and soiled water is the most significant concern of the Planning Authority in terms of surface water quality. The spreading of manure can be considered to have potential indirect effects on surface water at the location it is spread. For the purposes of clarity, the Commission should note that land spreading does not form part of this application and such process is regulated under the European Union (Good Agricultural Practice for Protection of Waters) Regulations 2022 S.I. No. 113/2022 (the GAP Regulations), not by An Coimisiún Pleanála. The development under consideration in this instance is the poultry farming operation; similar to the EPA, the statutory power of An Coimisiún Pleanála does not extend to the authorisation of the possible end-use of the poultry litter or wash water generated, which is governed by other statute. The GAP regulations are the appropriate mitigation for such effects.

7.6.6.3.4. I note that Section 1.6 of the EIAR sets out that customer farm lands identified for landspreading of manure are tillage lands. There is some detail at Appendix 1 in relation to quantity of fertiliser produced and demand for same and Appendix 6 has broad detail in relation of location of farms to receive waste for fertilizer. I agree with the Planning Authority that this detail is limited. However, as the development under consideration is not the landspreading itself, I do not consider this a shortcoming of the EIAR. In considering in-combination effects the application of the GAP regulations would appropriately mitigate potential significant effects.

7.6.6.3.5. In relation to soiled water, the house (existing and proposed) will operate on a dry manure and dry cleaning system. Some soiled water will be generated from the cleaning of houses. Water generated from cleaning of houses, is not intended to discharge to surface (or ground) water. I note from the EIAR that the cleaning of houses typically consists of blowing down the houses, onto manure conveyor belts, and use of water alone. Section 3.4.2 refers to high pressure wash down systems (3,000 psi) The proposed houses will be cleaned down after each batch of birds so as to ensure that the highest levels of bio-security are maintained on the farm. Houses will be primarily blown down with limited washing. Soiled water collection tanks have been allowed for to facilitate this washing process if and when it occurs. Although it is not clear how frequently the structure will be cleaned, as the birds are not a single batch, the soiled water from cleaning is therefore suitable for land spreading and does not represent an additional source for potential impacts on surface or ground water.

7.6.6.3.6. The amount of soiled water generated and basis of calculation is detailed at 3.6 of the EIAR at c. 200m³ per annum from existing and proposed development. Further information is set out at section 4.9 and 7.2; soiled water from the proposed development, or wash water, is to be collected in a number of dedicated soiled water collection tanks (stated to be 4 existing and 1 proposed) total capacity c. 120 m³ (being greater than 26 week storage capacity).

7.6.6.3.7. The proposed storage tank for soiled water is shown on the architectural drawings (Plans, Elevation, Section Drawing PL01A), and indicates a 60m³ tank measuring 3.6m x 3.25m x 8.6 m, located underground. However, the location of the tank is not indicated on the site layout plans (PL02, PL02C), which should be addressed by condition, in the event that the Commission grants planning permission. This wash water to be held in this tank is intended for landspreading. The EIAR indicates in Section 9.3 that these tanks must adhere to the Department of Agriculture's Farm Building and Structures Specifications and must be monitored and recorded in line with EPA requirements at least every five years.

7.6.6.3.8. The applicant does propose some spreading of soiled water on the landholding/site and thus some functional interdependence with these lands exist in

this regard. The EIAR states that “the applicant has an additional c. 2 Ha hectares of lands (in excess of that required for the range area for the hens for the existing enterprise and the site area for the proposed development) suitable for the application of soiled water.” The EIAR also notes that the soiled water may also be spread on customer farmland.

7.6.6.3.9. The EIAR states that under the Nitrates Directive, the standard limit for spreading nitrogen from livestock manure is 170kg/ha per year per year. As per Section 3.6 of the EIAR states “the organic N stocking rate on these lands is c. 0 kg organic N/Ha. The application of an c. 200 m³ of soiled water to these lands with an estimated Organic N content of c. 1.37 kg organic N/m³ will increase the organic N application rate on these remaining farmlands from the proposed development to c. 137 kg organic N/Ha, well inside the 170 kg organic N/Ha limit”

7.6.6.3.10. I consider that the applicant has demonstrated that the soiled water can potentially be spread on adjacent lands within his ownership, within the common limit quoted for Nitrogen limit. However, the specific limit for the site will depend on soil test values and other factors. I note from EPA mapping the PIP-N (Pollution Impact Potential – Nitrate) on the landholding is from Rank 4 to 7 (Rank 1 being highest, Rank 7 lowest) and the PIP- P (Pollution Impact Potential – Phosphorus) is generally Rank 1. Therefore, spreading of soiled water on the landholding will depend on site specific assessment, and again will be regulated by the GAP regulations rather than any consent under planning legislation.

7.6.6.3.11. I have considered the application and appeal and report of the Planning Authority in terms of impact on water quality and relevant case law referred to above. I also refer the Commission to the Water Framework Screening of the proposed development attached as Appendix 3. I am satisfied that that the scope of the project does not extend to the spreading of manure and soiled water on lands. The regulation and assessment of such activities is beyond the remit of the Commission. In this regard, I am satisfied that there is no potential for any significant direct effects on surface water quality from the proposed development, and while there is potential for indirect cumulative effects on surface water from landspreading, this will be mitigated by the GAP regulations. The Commission is not in a position to

limit the destination of manure or control its application as fertiliser as part of this application, nor would such activity be authorised as part of any grant of permission for such development. I consider this perspective is consistent with the outcome of *An Taisce v An Bord Pleanála & Ors JR 2020/566* referred to at 6.2.4 above.

7.6.6.3.12. In terms of surface water management, Appendix 20 of the EIAR sets out infiltration tests from two trial pits indicating that infiltration is not feasible and EIAR therefore sets out that all roof water and uncontaminated storm water from the proposed development site will discharge to surface water. This will be via a designed storm water drainage system, via a petrol interceptor, to swale attenuation drainage system and/or storm water attenuation tank channel, at pre-development green-field runoff rates. Q-bar calculations are presented for catchment of 1.52 hectares (proposed structures and concrete aprons) demonstrating attenuation required. The required stormwater attenuation volume for the development is calculated having regard to a 1 in 100 year flood event + 20% climate change. A sealed storm line around the building is shown on site layout plan (PL02C). Section 4.2.2. in Appendix 20 sets out two options; a swale system or a below ground stormwater attenuation tank/cellular system. It is not clearly stated which is the preferred option, however the site layout plan indicates a swale, so the proposal is assessed as such.

7.6.6.3.13. A drainage channel is proposed to be diverted to facilitate the location of the proposed structure. Hydraulic analysis was undertaken in order to assess the ability of the proposed diverted drainage channel to convey the predictive 1% AEP+CC (1 in 100 year + climate change) flow volume of the existing drainage channel. It is concluded that capacity is sufficient and surcharging or out of channel flow is not predicted to occur. Section 5 of Appendix 20 provide design details for the diverted drainage channel.

7.6.6.3.14. There are four existing culverts relevant to the development. Two existing culverts are proposed to be removed to facilitate the development (these are culvert #3 which forms part of an access point to lands to the north, which is no longer used, and culvert #4 which is at the location of the proposed building and part of the drainage channel to be diverted.)

7.6.6.3.15. Culvert #1 is located on the watercourse channel immediately downstream of the proposed development (to north). Culvert #2 is at the location of the access road (to west). In terms of flood risk, a hydrological assessment of the and culverts and their capacity was undertaken. Section 5 of Appendix 20 details this. It concluded that the two existing culverts do not have sufficient hydraulic capacity to convey the 1 in 100 year event + climate change flow volume and require to be upgraded. Therefore there is potential for flooding within the landholding, which may affect the development. Note, these two culverts are upstream of the discharge point from proposed storm water system and relate to a current surface water drainage assessment of the landholding. Section 7 of Appendix 20 provide design details for culvert upgrades.

7.6.6.3.16. I note internal reports from the planning authority seeking flood risk assessment. Having regard to the detailed assessment above and the location of the site within flood zone C I do not consider that further assessment is warranted.

Groundwater - Quality

7.6.6.3.17. As above, potential construction/operational impacts on groundwater e.g. siltation, hydrocarbon spillage, have been considered under the Water Framework Screening attached to this report, and under Biodiversity above and within the Appropriate Assessment attached and I do not intend to repeat same. Mitigation through best practice construction methods is proposed at construction stage. At operation stage, no infiltration is proposed within the site, as investigations indicate that infiltration is not feasible.

7.6.6.3.18. There are no proposals to dispose of soiled water (washwater from the poultry house) for infiltration to ground. The existing poultry house is served by a septic tank and percolation area. The EIAR states in Section 7.2 that staff facilities (WC etc) have been provided at the existing poultry house and no additional facilities are currently proposed. I consider it unlikely that the proposed poultry house does not itself require welfare and washing/changes facilities for staff, even in terms of cross contamination alone. This would generate requirements for potable water supply and wastewater disposal. There is an absence of clarity on this aspect of the

development and potential discharge to ground of wastewater from same. However, I accept the application as presented and note that no wastewater treatment system is before the Commission for consideration as part of the proposed development and that this aspect of the development will also be subject to other regulatory requirements, including those relating to licencing and staff welfare at work.

7.6.6.3.19. In relation to landspreading, the same considerations of impacts from landspreading on surface water quality apply to groundwater quality. The statutory power of An Coimisiún Pleanála does not extend to the authorisation or regulation of the possible end-use of the poultry litter or wash water generated, which is governed by other statute. I note that the GAP regulations require landspreading to take account of any wells within the site and separation distances to same.

Groundwater – Quantity (New Issue)

7.6.6.3.20. The application form indicates that a private well is proposed rather than extension of the public water network. I noted 3 structures associated with wells during site inspection; these are not however marked on the site layout plan (PL02) or referred to specifically in the application. The EIAR states that while rain water harvesting was considered it is deemed inappropriate due to the potential disease risk from wild bird contamination.

7.6.6.3.21. The EIAR states (Section 3.4.3 p. 62) that water supply will be from a deep well to be located on-site and/or the Ballymakenny/Sandpit Water Scheme. (I cannot find reference to Sandpit Water Scheme, however I note from GSI Groundwater Data Viewer that Ballymakenny GWS is sourced just north of Drogheda Town from a Regionally Important Aquifer, i.e. different to the aquifer underlying the site where boreholes are or are proposed.) There is no letter of consent to connect to the Group Water Scheme within the application documents, despite reference to same in the Planning Authority report. The application form states that water supply will be from an existing private well.

7.6.6.3.22. Demand on water referred to in the EIAR relates to both poultry houses combined, 124,000 birds. Water is to be stored in an on-site water storage tank with

a capacity of c. 25m³. It is also on p 62 stated that the water used per annum will equal, circa 10,000 m³ (c. 24.5m³/day on average). I note that 10,000 m³ per annum in fact equals c. 27.4 m³ per day.

7.6.6.3.23. Section 4.11.12 page 88 of the EIAR states “Water supply will come from an existing/proposed deep bore well located on site, and connection to the local group water scheme. Proposed Average daily water usage = c. 80 m³/’000 birds/annum.” There appears to be a typographical error in the above, referencing proposed average daily water usage. However, I calculate 80m³x124,000 birds (taking both houses) = 9920m³ water usage annually or 27.17 m³ water daily.

7.6.6.3.24. The EPA is the competent authority for licensing water abstractions. The threshold for registration for water abstraction with the EPA is 25m³ per day, which the entire farm will potentially exceed. Any abstraction equal to or greater than 2,000 m³/day will require an abstraction licence. Any abstraction between 25 m³/day and <2,000 m³/day will be assessed by the EPA to determine if it is a significant abstraction¹. If an abstraction is deemed to be significant, an abstraction licence will be required.

7.6.6.3.25. Section 6.3 of the EIAR states the site is located over a Poor Aquifer (Pu), with a Moderate vulnerability. Poor (P) aquifers would generally have ‘moderate’ or ‘low’ well yields - less than 100 m³/d. GSI data indicates that this groundwater body extends across an extensive area (60.5-sq.m.km)

7.6.6.3.26. To summarise, the source of water for the proposed development is unclear. The quantity to be extracted at various abstraction points is not stated, and boreholes are not indicated on site layout plan (PLO2). The volume of water proposed to be used by the two poultry houses is of a quantity which would typically require to be assessed by the EPA to determine if it constitutes a significant abstraction. The EIAR has not considered whether the extraction volume is significant, having regard to EPA Guidance. Although the need for licencing of abstraction would be assessed by the EPA, there is no reference in the EIAR to the

¹ EPA Water abstractions and associated impoundments - Methodology to assess and identify significant abstractions in Ireland August 2025

significance of this extraction in terms of the cumulative effect of proposed groundwater extraction for the development when taken with other developments in the area with significant demands on water. (e.g. I note the presence of a quarry at Gallstown c. 2km from the site.) There are also a number of other boreholes indicated on GSI mapping in the vicinity to the north which are not considered in the assessment.

7.6.6.3.27. I therefore do not consider that the level of abstraction from groundwater sources is clear, or that the impact of extraction on groundwater resources, alone or cumulatively, has been considered.

7.6.6.3.28. I also note here assessment above under Section 7.6.4 relating to impacts of groundwater abstraction on wetland habitats in the vicinity of the site, i.e. Carrickbaggot wetlands, and the possibility of direct and indirect effects on same.

7.6.6.4. Conclusion Direct and Indirect Effects.

Surface water: I am satisfied that construction impacts on surface water quality and be satisfactorily mitigated to prevent any significant effects on surface water quality, and that the storage of soiled water generated does not present a risk to surface water. Landspreading of this water, at operational stage, and potential impacts on surface water quality, both from the project alone cumulatively with other landspreading, is regulated by the GAP regulations and that subject to adherence thereto, that no significant in-combination effects are likely. I am satisfied that proposed surface water drainage arrangements have been adequately designed and detailed in terms of flood risk assessment and surface water management. Any further design detail (i.e. swale or tank specification) for storm water management may be agreed with the Planning Authority by condition, in the event of a grant of planning permission. I am satisfied that as the surface water disposed to land drain will be at pre-development green-field runoff rates there will be no impact on the culvert benefitting Irish Rail Infrastructure. Accordingly I am satisfied that there is no potential for any significant direct or indirect effects on surface water as a result of the proposed development.

Ground water: I am satisfied that mitigation measures during construction are sufficient to prevent any significant effects on ground water quality, and that the storage of soiled water generated does not present a risk to groundwater. As above, landspreading of this water, or of manure, at operational stage, and potential impacts on ground water quality, both from the project alone cumulatively with other landspreading, is regulated by the GAP regulations. However, I am not satisfied with regard to the impact assessment on groundwater quantity. The water source is unclear, its significance has not been assessed, and cumulative effects on water supply in the area have not been considered. Accordingly I am not satisfied that there is no potential for any significant direct or indirect effects on ground water as a result of the proposed development. Indirect effects on wetlands (discussed at Section 7.6.4.3) and water supply as a material asset (Section 7.6.11.3) are again noted. This is a **New Issue**, and the Commission may wish to seek the views of the parties in this regard.

7.6.7. Air

7.6.7.1. Issues raised in the appeal/application.

No issues were raised in the application or appeal in relation to air.

7.6.7.2. Examination of the EIAR.

Air (odour and particulate emissions) is addressed in section 6.4 and 7.4 of the EIAR and an Air Quality Impact Assessment (AQIA) forms Appendix 18. The AQIA sets out criteria for Particulate Matter, Odour, Ammonia and Nitrogen Deposition. In relation to odour the AQIA states out clear parameters and methodology, using odour target value of $\phi 98$, 1-Hour ≤ 3 as the appropriate benchmark level. Of the 11 sensitive receptors (dwellings) identified, the highest output modelled was 1.57 ou/m³, which was below the benchmark of 3 ou/m³, adopted as a conservative target value.

In terms of particular matter PM₁₀ and PM_{2.5}, modelled output are below the annual average and short term thresholds.

The assessment within the AQIA focusses on ammonia and nitrogen deposition at sensitive ecological sites using a conversion factor for nitrogen based on the data relating to ammonia. These are considered in more detail at 7.6.4 above and within the Appropriate Assessment attached.

I note that the impact on air from ammonia in terms of human health is not considered. Based on the nearest sensitive receptors mapped in Appendix A of the AQIA and modelling results in Appendix C ammonia levels appear to be 10-50ug/m³ at the location of the nearest residential properties and dissipate further beyond.

Section 7 of the AQIA refers to cumulative assessment in relation to ammonia. It states that in order to carry out a cumulative assessment it was necessary to identify any nearby installations that also have the potential to contribute a significant ammonia impact, but that there are no such sites.

7.6.7.3. Analysis, Evaluation and Assessment: Direct and indirect effects

Please refer to Section 7.6.4 above in relation to biodiversity, in particular potential effects on European sites from ammonia emissions and nitrogen deposition. These are also addressed in significant detail within the Appropriate Assessment attached to this report as Appendix 2.

In terms of particular matter PM₁₀ and PM_{2.5}, modelled output are below the annual average and short term thresholds. I note that the EIAR and AQIA do not consider particulate matter emissions during construction stage i.e. dust, however given the scale of the development, the trip generation and nature of materials to be imported to site, I consider it unlikely that there would be significant effects from dust generation, beyond that which would be managed under a CEMP, which may be attached by condition should the Commission decide to grant planning permission.

With regard to ammonia and human health, there is no specified threshold for ammonia for human health in Ireland. The UK Environment Agency has outlined a long-term environmental assessment levels for ammonia of 180 ug/m³. In this context I consider it unlikely that there would be significant effects on air quality from the proposed development in terms of human health.

The AQIA does not indicate what area in proximity to the site was considered or the nature of developments within that area, in terms of ruling out potential cumulative effects. In addition, the remarks in relation to cumulative impact on air quality are only in relation to ammonia, rather than odour or particular matter. I note the presence of a quarry c. 2km from the site including waste recovery operations (reg ref 23/60422). I am not satisfied that a cumulative assessment of impact on air quality has been considered. However, I note that the baseline survey accounts for existing conditions and having reviewed recent planning permissions within 10km of the site I could not identify other permitted/proposed developments which would require consideration. I also note that emissions are typically controlled by conditions of an IE licence, which the proposed development will require.

7.6.7.4. Conclusion: Direct and indirect effects.

I have concluded under Section on 7.6.4 that impacts on air quality and related effects from ammonia emissions on biodiversity (Clogher Head SAC) cannot be ruled out. I am otherwise satisfied there is no potential for any significant direct, indirect or cumulative effects on air quality as a result of the proposed development.

7.6.8. Noise

7.6.8.1. Issues raised in the appeal/application.

No issues were raised in the application or appeal in relation to noise.

7.6.8.2. Examination of the EIAR.

This matter is addressed briefly in Sections 1.1 and 2.9 of the EIAR along with Sections 6.7 and 7.7 and a Noise Impact Assessment (NIA) has been included as Appendix 15 to the EIAR. The EIAR states that there will be a slight negative potential impact during construction and no impact during operation.

In terms of construction, the NIA notes that due to the fact that the construction programme has not been established, it is difficult to calculate the actual magnitude of noise emissions to the local environment. Typical noise levels are predicted using guidance set out in BS 5228-1: 2009: Code of practice for noise and vibration control

on construction and open sites. The survey concludes that construction noise levels at the nearest residential dwellings in the vicinity of the proposed development are all well below the 65dB LAeq maximum criteria for construction activities during daytime and 55dB LAeq maximum criteria during evening / weekend periods

In terms of operation stage, the predicted noise emission levels of poultry house livestock and of ventilation fans are predicted to be at < 10 dB LAeq at sensitive receptors, and traffic movements at 34 dB at the nearest noise sensitive receptors, within required criteria.

7.6.8.3. Analysis, Evaluation and Assessment: Direct and indirect effects.

I am satisfied in relation to the EIAR assessment of noise impact and note no likely significant effects from same. I note that there is no information on the model or software used or representation of the noise contours generated that inform prediction. However, having regard to the nature of the development and surrounding area I consider that the matter of noise limits may be addressed by condition, in the event the Commission decides to grant planning permission for the development.

7.6.8.4. Conclusion: Direct and indirect effects.

I am satisfied there is no potential for any significant direct, indirect or cumulative effects on air in terms of noise as a result of the proposed development.

7.6.9. Climate

7.6.9.1. Issues raised in the appeal/application.

No issues were raised in the application or appeal in relation to climate.

7.6.9.2. Examination of the EIAR.

This matter is addressed briefly in Sections 6.5 and 7.5 of the EIAR. The EIAR states that there will be no significant effects on climate. Recycling of nutrients reduces the need for chemical fertilisers which release large quantities of greenhouse gases

contributing to climate change. Poultry meat and eggs tend to be at the lower end of the spectrum in terms of carbon footprint and the proposed development will reduce the carbon footprint by negating the need to import eggs. The farm is not directly significantly susceptible to climate change although climate change may impact on energy use associated with ventilation systems to maintain a controlled environment and may impact on crop yields etc.

7.6.9.3. Analysis, Evaluation and Assessment: Direct and indirect effects.

I am satisfied overall that direct and indirect effects on climate have been assessed to an adequate degree.

7.6.9.4. Conclusion: Direct and indirect effects.

I am satisfied there is no potential for any significant direct, indirect or cumulative effects on climate as a result of the proposed development.

7.6.10. Material assets.

7.6.10.1. Issues raised in the appeal/application.

No issues were raised in the application or appeal in relation to material assets. I note that Irish Rail submitted an observation in relation to the nearby railway line (see assessment under Surface Water) but no issues were otherwise raised.

7.6.10.2. Examination of the EIAR.

Sections 6.12 and 7.12 of the EIAR deal with Material Assets. The EIAR considers the proposed development will have a positive interaction with the applicant's and customer farmers agricultural activities and will require a minimal amount of land to complete the proposed works and a limited amount of construction materials. It is well removed from other farms and not a bio security risk to them. The EIAR identifies the 11 nearest residential properties which range from 640m to 1000m from the proposed poultry house. It states that an odour impact assessment and noise impact assessment confirmed that the proposed development will not cause an adverse impact at the closest sensitive receptors and potential impacts will be

imperceptible, and/or within applicable criteria at these locations. It considers the development will be well screened from public view and removed from any tourist areas.

The EIAR states in section 7.12 that the farm does not require any major modifications to the existing electricity supplies, water or road infrastructure in the area.

Traffic is set out at Section 6.8 of the EIAR. It states that the development and will be accessed by a proposed new entrance as indicated on the plans and drawings submitted with the application. (However I note this entrance is existing, and access works consist of the extension of an existing surfaced internal farm road.) It outlines operational traffic for the existing poultry house as typical of that of the proposed poultry house: c. 1.5 loads of organic fertiliser per week (@ 30 m³/load), c. 1.5 feed deliveries/week, c. 5 egg collections/week, 2 staff daily, stock transport (8 loads out and 8 loads in) at the end/start of each flock (c. every 14-15 months). Some information on construction traffic is provided at 7.8.2 which states that completion is expected to take 12 months and HGV movements will amount to c. 3-4 loads/day over this period. There will be an additional 2 – 4 journeys daily associated with labour to and from the site. The materials to be used in construction are set out on page 60 and are not of unusual nature or scale.

Chapters 2 and 4 set out that that energy will be required mainly for heating, ventilation, lighting, automation (feed, conveyors) and controls. There will be reduced energy input (due to high insulation standards, and the installation of solar panels on the existing and proposed poultry houses). Energy usage is anticipated to be c. 3-4 kW per bird place per annum (180MW-240mWh per year). It states that energy supply to the farm is electric three phase supply. A back-up generator will also be provided. A 62 kW solar panel system has been developed on the existing poultry house. The EIAR is ambiguous in relation to solar panels on the proposed poultry house; stating in some section that they are planned (1.16) and in other places that they will be considered (4.9, 4.11). I note that though solar panels do not form part of the development description, they are clearly indicated on drawings.

In relation to water supply, the development proposed water use of 25m³ per day. There is ambiguity in the application and EIAR in relation to the source; The application form indicates that a private well is proposed rather than extension of the public water network. The EIAR refers to existing boreholes, proposed boreholes and Group Water Scheme Connection. I refer the Commission to Section 7.6.3.20 – 7.6.3.27 for more detail on groundwater resources.

7.6.10.3. Analysis, Evaluation and Assessment: Direct and indirect effects.

The EIAR adequately assesses potential effects on residential properties and the above assessment of impacts on air under Section 7.6.8.3 is also relevant and taken into account in this conclusion.

Given the scale of the development, the trip generation and nature of materials to be imported to site, I consider it unlikely that there would be significant effects on roads infrastructure, subject to the submission of a CEMP detailing haul routes, materials, hours of operation, load limits etc, for construction phase, which may be ensured by condition in the event the Commission decides to grant planning permission for the development.

I note that average household electricity consumption in Ireland is approximately 4,200 kWh per year (CRU) therefore the proposed poultry house will use the equivalent of c. 60 houses, excluding any electricity provided by solar panels. Based on this I do not consider that it is unlikely that the proposed development will have a significant effect on electricity supply.

As above, in the absence of clarity on quantity of water supply, source of water supply and proportion from groundwater, along with cumulative impact with other draws on water resources, there is inadequate technical information to address this matter in the EIAR. I am not satisfied that the proposed development would not have a significant effect on water supply in the local area.

7.6.10.4. Conclusion: Direct and indirect effects.

Other than water supply, I am satisfied that there is no potential for any significant direct, indirect or cumulative effects on material assets as a result of the proposed development.

7.6.11. Cultural Heritage and Landscape

7.6.11.1. Issues raised in the appeal/application.

No issues were raised in the application/appeal in relation to cultural heritage other than the need for Archaeological Impact Assessment. No issues were raised in the application or appeal in relation to visual impact or landscape.

7.6.11.2. Examination of the EIAR.

There is no reference in Chapter 6 of the EIAR and content relating to cultural heritage and landscape appears to be misplaced at the end of Section 7.10 and page 152. This section notes 3 archaeological sites within the landholding (as detailed at 5.4.3 above in this report), and an additional enclosure LH021-017 approx. 400m east of the red site boundary with the railway line. It notes that all works are proposed to be located outside the zones of notification associated with these features and will not require significant excavation. The EIAR notes that there are no Protected Structures within the site, that the entrance to Rokeby Hall, a protected structure under reference 13901802 & 13901801 is located opposite the entrance to this farm and that Rokeby Hall is designated as a Historic Garden and Designated Landscape in the County Development Plan 2021-2027. It considers that given the distance to, and the setting of the proposed development, low set in the landscape and on an existing poultry form, the proposed development will have no significant adverse impact on the architectural heritage of the area.

A report from the DoHLGH Development Applications Unit requests Archaeological Impact Assessment by way of Further Information. It notes that given the scale, extent and location of the proposed development it could impact on subsurface archaeological remains.

Visual impact/landscape is considered in Section 6.6 and 7.6 of the EIAR which notes (p152) that the proposed development is not located near any Areas of Outstanding Natural Beauty, Areas of High Scenic Quality, Scenic Routes, Views and/or prospects, as identified in the Louth County Development Plan and details the Landscape Characterisation of the area. Section 7.6 of the EIAR states that the proposed development has to be located away from the existing development due to the free range nature of the existing activity, the location will be integrated into the surrounding landscapes, will benefit from existing hedgerows and additional landscaping will be screened from the surrounding road and the materials and finishes will enable it to blend in. It concludes the farm will have no impact on the landscape or visual/scenic characteristics of this area.

7.6.11.3. Analysis, Evaluation and Assessment: Direct and indirect effects.

I note that, pending Archaeological Impact Assessment (AIA) there are potential impacts on archaeological heritage, and the DAU requests Archaeological Impact Assessment by way of Further Information. I consider that this AIA would adequately mitigate against potential impacts on archaeology. In addition, given the extent of development is very limited within the confines of the site as outlined in red, I am of the opinion that this requirement could as effectively be undertaken as a condition of permission in the event of a grant of permission. I am satisfied that potential significant effects on archaeological remains can be avoided, managed and mitigated by the measures proposed in the requirements of the DoHGLH, which may be attached by condition, should the Commission grant permission for the proposed development.

In terms of landscape, while the EIAR details the features and measures which will mitigate the visual impact of the development, no landscaping proposals are included. There is no evidence of consideration of the actual impact after these measures and no photographs or photomontages depicting the existing site and site with proposed development. Even as minimum, proposed location and height of structures have not been indicated on photographs from any selected viewpoints. However, I have considered the visual impact of the proposed development from surrounding areas. I consider that there will be a visual impact from the proposed

development, and though the effect will be slightly negative (being an additional structure in the open landscape) and permanent, it will be limited in extent due to siting and topography and will not be out of context in the area. Therefore I consider that the likely effect on landscape and visual amenity is not significant, but that a landscaping condition should be attached in the event the Commission decides to grant permission for the proposed development.

7.6.11.4. Conclusion: Direct and indirect effects

I am satisfied that, subject to AIA and landscaping conditions, there is no potential for any significant direct, indirect or cumulative effects on cultural heritage or landscape as a result of the proposed development.

7.6.12. The interaction between the above factors

7.6.12.1. This is addressed in Section 8 of the EIAR and a matrix is provided along with some commentary on areas of neutral and positive impacts. No negative impacts are identified in terms of interactions of the environmental factors.

7.6.12.2. I note the matrix indicates that interaction between the EIA topics is largely considered N/A (not applicable) and I do not consider this is this case. I note that the table contains several contradictions depending on where the inter relationship of factors are addressed. E.g. Land & Soil interaction with Water is 'Neutral' but Water interaction with Land & Soil is 'N/A.' Similarly Air with Biodiversity (Neutral) compared to Biodiversity with Air (N/A) and Land and Soil with Water (N) Water with Land and Soil (N/A), etc. This undermines confidence in the assessment.

7.6.12.3. I have considered the interrelationships between factors and whether these might, as a whole, affect the environment, even though the effects may be acceptable when considered on an individual basis. In my assessment of each environmental topic, I have considered the likelihood of significant effects arising as a consequence of interrelationship between factors. Most interactions e.g. the impact of noise and air

quality on the population and human health, biodiversity and the impact on water on the material assets are addressed under individual topic headings.

7.6.12.4. On the basis of my report above, I conclude that the EIAR does not assess the interaction between water (groundwater abstraction) and material assets (water supply). The assessment of water (groundwater abstraction) and biodiversity is stated to be neutral; however this does not include considerations of impact on wetland habitat through possible streamflow depletion. The interaction between air and biodiversity is stated to be either Neutral or N/A which does not reflect ammonia emissions, in particular emissions reaching European sites. There are also inconsistencies in the matrix, as described above. I therefore conclude that the consideration of the interaction between environmental factors is inadequate.

7.6.13. The vulnerability of the proposed development to risks of major accidents and/or disasters.

No issues were raised on this matter in the application or appeal. The EIAR states “The potential risk to human health / cultural heritage and/or the environment due to accidents and/or disasters is limited due to the innate nature of the production system and activities on-site. The site is not a risk of flooding. There are no significant high risk/hazardous products used, produced and/or released by the proposed development which would pose a risk to human health, cultural heritage and/or the environment outside of the site boundary as a result of any accident/disaster.”

I do not consider that the proposed development is particularly vulnerable to risk of major accident or disaster and consider this acceptable.

7.7. Reasoned Conclusion:

Having regard to the examination of environmental information contained above, and in particular to the EIAR and supplementary information provided by the developer, and the report from the planning authority, prescribed bodies, and observers, it is

considered that the main significant direct and indirect effects of the proposed development on the environment, are:

- Direct effects on ground water resources, which cannot be fully assessed from the information available
- Direct effects on material assets (water supply) from ground water abstraction, which cannot be fully assessed from the information available
- Indirect effects on biodiversity (wetlands) arising from groundwater abstraction and potential downstream depletion, which cannot be fully assessed from the information available
- Indirect effects on biodiversity (Clogher Head SAC) from ammonia emissions, which cannot be fully assessed from the information available

It is considered that matters relating to ground water resources (as they relate to the topics of water, material assets and biodiversity) and biodiversity (as it relates European sites and wetlands) are not adequately addressed in the EIAR.

It is considered therefore that the proposed development could result in significant direct effects on water (groundwater) and material assets (water supply) and significant indirect effects on biodiversity (wetland habitat and Clogher Head SAC) and that permission should be refused.

8.0 Assessment of Other Matters

- 8.1. Principle of development: Having regard to the absence of any specific land use zoning for the site and the rural and agricultural nature of the area, as well as existing use on site, I consider the principle of the proposed development acceptable. The proposal is consistent with Objectives EE 55, EE 60, and EE 61 of the LCDP.
- 8.2. The planning considerations associated with the development are otherwise addressed in the EIA above and it is not intended to repeat the assessment. However, with reference to particular LCDP policy, I note the following:

- 8.3. Design and siting: Having regard to Section 13.13.11.7 Agricultural Enterprises and Buildings, and noting the requirement for the proposed poultry house to be sited such that the free range area of the existing poultry house is not impeded, I consider the siting of the proposed structure acceptable. It makes use of an existing entrance serving an existing poultry house, this co-location will enable shared traffic movements and minimise impact. The structure is positioned at lower levels within the landholding, does not affect any views/scenic areas which together with design and materials, will minimize visual impact. This matter is assessed in further detail in the EIA.
- 8.4. Residential Amenity: Matters relating to impacts on residential amenity are assessed in detail within the EIAR, and I refer the Commission to relevant environmental factors assessed including air emissions (odour, ammonia, particulate matter, noise), traffic, human health, population and material assets. I do not consider that the proposed development would detract from the residential amenity of dwellings in the area.
- 8.5. Landspreading: Again, for the purposes of clarity, the Commission should note that land spreading does not form part of this application and such process is regulated under the European Union (Good Agricultural Practice for Protection of Waters) Regulations, as amended.
- 8.6. I note that failure to protect and enhance wetland sites, as outlined in the EIAR, would be contrary to objective NBG 20 of the Plan.
- 8.7. I note objective NBG 20 of the LCDP states that proposed plans, programmes and projects shall not have an unacceptable impact on the water environment, including groundwater quality and quantity. I consider that uncertainties in relation to wells within the landholding and unknown impact on groundwater quantity due to extraction levels, would be contrary to the above objective.
- 8.8. I consider that the matter of a confirmation of Section 50 licence under the Arterial Drainage Act, 1945, as raised by the Planning Authority is primarily a matter for the OPW and is not central to the planning and environmental matters under consideration. This matter thus need not concern the Commission for the purposes of this appeal.

9.0 Appropriate Assessment

- 9.1. In screening the need for Appropriate Assessment, it was determined that the proposed development could result in significant effects on Clogher Head SAC, Boyne Coast and Estuary SAC, Dundalk Bay SAC, North-West Irish Sea SPA and Dundalk Bay SPA in view of the conservation objectives of those sites and that Appropriate Assessment under the provisions of S177V was required.
- 9.2. Following an examination, analysis and evaluation of the NIS all associated material submitted and taking into account observations/submissions, I consider that adverse effects on site integrity of the Clogher Head SAC cannot be excluded in view of the conservation objectives of this site and that reasonable scientific doubt remains as to the absence of such effects.
- 9.3. My conclusion is based on the following:
- The identification (within the NIS) of the SAC as being within the zone of influence of modelled ammonia emissions from the proposed development;
 - Background concentration of ammonia already exceeding critical level of ammonia at the SAC;
 - The provisions of EPA Licence Application Instruction Note 1 (IN1) Assessing the Impact of Ammonia Emissions and Nitrogen Deposition from Intensive Agriculture Installations on European Sites 2024;
 - Deficiencies within the NIS, in particular failure to consider the impact of modelled ammonia emissions on the specific Conservation Objectives of the Qualifying Interests of European Dry Heaths within this European Site; and consequently
 - The absence of any clear determination that there is no risk of an adverse effect on the integrity of the European Site from ammonia emissions from the proposed development.
 - Inadequate details of consideration of in-combination effects on Clogher Head SAC.
- 9.4. I highlight to the Commission that the application (and the submitted Air Quality Impact Assessment) was prepared having regard to an earlier (2021) version of EPA Licence Application Instruction Note 1 (IN1) Assessing the Impact of Ammonia

Emissions and Nitrogen Deposition from Intensive Agriculture Installations on European Sites. The current 2024 assessment methodology differs and has had a significant bearing on the outcome of the Appropriate Assessment carried out in Appendix 1. This is a **New Issue**, and the Commission may wish to seek the views of the parties in this regard.

10.0 Conclusion and Recommendation

To conclude, I consider the principle of the proposed development acceptable, along with its location and siting, in terms of LCDP policy and visual and residential amenity.

I note the following key issues in coming to my conclusions on this proposed development.

10.1. Appropriate Assessment

- 10.1.1. The applicant has submitted a Natura Impact Assessment with the application. On the basis that the impact of ammonia emissions will not be experienced beyond a 7.5km distance from the site (derived in the Air Quality Impact Assessment (AQIA) within the application) the applicant has screened in 5 European Sites.
- 10.1.2. The applicant in considering the impact of the development on European Sites, has applied "*Licence Application Guidance. Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations. Environmental Protection Agency (EPA) Version 1.0, May 2021*". in the AQIA (page 22). In the NIS (page 29) reference is made to a 2022 version of this document. The current guidance is EPA Licence Application Instruction Note 1 (IN1) Assessing the Impact of Ammonia Emissions and Nitrogen Deposition from Intensive Agriculture Installations on European Sites 2024. The methodology used and conclusions reached in the application/AQIA/NIS cannot be reached for each site based on the 2024 Instruction Note.
- 10.1.3. In conducting an Appropriate Assessment of the sites screened in by the applicant, I determined, having regard to the methodology set out in IN1, and the Qualifying Interests of the site and their Conservation Objectives, that adverse effects can be ruled out for all sites except Clogher Head SAC.

10.1.4. European dry heaths 4030 are a relevant Qualifying Interest (QI) of this SAC, and are sensitive to ammonia emissions. The NIS submitted does not refer to the conservation objectives of QIs of the European Sites, including European Dry Heaths. It presents no specific information upon which it can be concluded that the modelled levels of ammonia (within the AQIA) at Clogher Head SAC will not have adverse effects on European Dry Heaths.

As such it cannot be concluded that the proposed development individually, or in combination with other plans or projects would not be likely to have a significant effect on European Site Nos. 001459 in view of the site's Conservation Objectives. In such circumstances the Commission is precluded from granting permission.

10.2. Environmental Impact Assessment

I have concluded having regard to the information contained within the application and EIAR and my own assessment that there is inadequate information to adequately assess the impact of groundwater abstraction from the proposed development, and the effect of same (alone and cumulatively) on material assets (water supply) and on biodiversity (nearby wetlands). The EIAR, with reference to Appropriate Assessment carried out, also failed to demonstrate that there would not be a significant effect on biodiversity in terms of effects of ammonia emissions on the Qualifying Interests of Clogher Head SAC.

10.3. Recommendation

I recommend that permission be refused on the grounds of the above deficiencies in the Appropriate Assessment and Environmental Impact Assessment, for the Reasons and Considerations set out below.

10.4. Note - New Issues

10.4.1. I note that the adequacy of the assessment of the impact of the proposed development on groundwater resources and water supply was not raised in the application, EIAR, planning authority EIA or in the appeal, and as such is a New Issue.

- 10.4.2. I note that the report of the planning authority highlighted the failure of the EIAR to identify wetlands within and beside the site, and assess the impact of the proposed development on same. Reference is made in the planning authority report to the impact on these wetlands being a reason for refusal. However this is not specifically carried through to the conclusions of that report, and reasons of refusal. The wetlands are not considered or referenced in the appeal submitted. While the wetlands themselves are not a New Issue in the above regard, the indirect effect of groundwater abstraction on these wetlands may be considered a New Issue, having regard to point 10.4.1 above.
- 10.4.3. Notwithstanding other deficiencies in the Appropriate Assessment, I note that the NIS and AQIA (upon which it is based), was carried out with reference to EPA guidance on Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations, EPA 2021 (as referenced in AQIA) or 2022 (as referenced in NIS) . This guidance was superseded in September 2024, since the making of the application. The updated IN1 is materially different to the 2021 document, and has had a significant bearing on the Appropriate Assessment I have carried out and the conclusions of same. As such it is a New Issue.
- 10.4.4. The Commission may wish to seek the views of the parties in the above regard.

11.0 Reasons and Considerations

1. Policy Objective NBG 20 of the Louth County Development Plan 2021- 2027 seeks to protect and enhance wetland sites. Policy Objective ENV 15 requires that proposed plans, programmes and projects shall not have an unacceptable impact on the water environment, including groundwater quality and quantity). The wetland site at Carrickbaggot is identified in the Louth County Wetland Survey as being of National importance.

Having regard to the information provided with the application and in the EIAR in relation to the location and volume of groundwater abstraction, and the failure to

assess the significance of same alone and cumulatively, and the failure to assess the impact of abstraction on water (groundwater resources), material assets (water supply) and biodiversity (wetlands), the Commission is not satisfied that the proposed development would not have a significant impact on the environment or accord with the provisions of the Louth County Development Plan 2021-2027. Accordingly to permit the proposed development would be contrary to the proper planning and sustainable development of the area.

2. Having regard to the results set out in the Air Quality Impact Assessment and to the deficiencies in the Natura Impact Statement submitted with the application, in relation to the effects of the modelled level of ammonia emissions on European Dry Heaths at Clogher Head SAC, the Commission cannot be satisfied that the proposed development individually, or in combination with other plans or projects, would not be likely to have a significant effect on European Site No. 001459 Clogher Head SAC in view of the site's Conservation Objectives. In such circumstances the Planning Authority is precluded from granting permission.

I confirm that this report represents my professional planning assessment, judgement and opinion on the matter assigned to me and that no person has influenced or sought to influence, directly or indirectly, the exercise of my professional judgement in an improper or inappropriate way.

Bébhinn O'Shea

Senior Planning Inspector

5th December 2025

Appendix 1: Appropriate Assessment Screening

Screening for Appropriate Assessment Test for likely significant effects	
Step 1: Description of the project and local site characteristics	
Brief description of project	<p>Normal Planning Appeal.</p> <p>Construction of poultry house and manure store with meal storage bins, soiled water tank, upgraded internal farm laneway, site drainage works (diversion of a drainage channel, two culvert upgrades and a swale/attenuation tank) and associated works</p>
Brief description of development site characteristics and potential impact mechanisms	<p>Site as outlined in red is 68.5 hectares (includes full farm area). Lands the subject of this development c.1.5 hectares. The site is agricultural land, gently undulating, c. 1m from Grangebellew and c 4.5 km from Dunleer. Surrounding land area is agricultural with low levels of one-off rural housing. There are existing land drains in the south of the site</p> <p>The development includes a manure store and soiled water tank, as these by-products are to be tanked for landspreading as fertilizer. Landspreading on customer lands outside the site is not considered to form part of this project for Appropriate Assessment purposes, although is noted as a potential in-combination effect</p> <p>No connections to public water supply or wastewater network. Stormwater drainage, following attenuation to existing land-drains via petrol interceptor.</p> <p>Potential impact mechanisms include emission to wate and emissions to air.</p>
Screening report	Screening element within NIS
Natura Impact Statement	Yes. Appendix 13 to EIAR. Whitehill Environmental
Relevant submissions	<p>An Taisce (submission to application)</p> <p>Peter Sweetman (observation on appeal)</p>

Step 2. Identification of relevant European sites using the Source-pathway-receptor model

Having regard to the characteristics of the project (which does not include landspreading on other farmholdings) I have identified the following sites for screening based on proximity and potential connectivity.

I note the Air Quality Impact Assessment (AQIA) considers a zone of influence of 7.5km; the application concludes that that the impact of ammonia and nitrogen will not extend beyond 7.5km from the site (EIAR p 121, AQIA p 20, NIS p 30)

European Site (code)	Qualifying interests ¹ Link to conservation objectives (NPWS, date)	Distance from proposed development (km)	Ecological connections ²	Consider further in screening ³ Y/N
Clogher Head SAC (001459)	ConservationObjectives.rdl	c.7km to east of site	No direct connection. Possible indirect – air emissions	Y
Boyne Coast and Estuary SAC (001957)	Site specific cons obj	c.7.5km to south east of site	No direct connection. Possible indirect – air emissions	Y
Dundalk Bay SAC (0004555)	Site specific cons obj	c. 8km to north of site	No direct connection. Possible indirect – air emissions - close to zone of influence of ammonia emissions.	Y
The River Boyne and River Blackwater SAC 002299	CO002299.pdf	c. 9.5 km south of site	No direct connection. Possible indirect – air emissions - but outside of zone of influence of ammonia emissions.	N

North-west Irish Sea SPA 004236	CO004236.pdf	c.4.6km to east of site	Indirect hydrological connection Possible indirect – air emissions	Y
Dundalk Bay SPA 004026	Site specific cons obj	c. 8km to north of site	No direct connection. Possible indirect – air emissions - close to zone of influence of ammonia emissions.	Y
Boyne Estuary SPA 004080	ConservationObjectives.rdl	c. 9km south of site	No direct connection. Possible indirect – air emissions - but outside of zone of influence of ammonia emissions.	N
The River Boyne and River Blackwater SPA	CO004232.pdf	c. 9.5 km south of site	No direct connection. Possible indirect – air emissions - but outside of zone of influence of ammonia emissions.	N

¹ Summary description / **cross reference to NPWS website** is acceptable at this stage in the report

² Based on source-pathway-receptor: Direct/ indirect/ tentative/ none, via surface water/ ground water/ air/ use of habitats by mobile species

³if no connections: N

Step 3. Describe the likely effects of the project (if any, alone or in combination) on European Sites

AA Screening matrix

M = Maintain R = Restore

Site name Qualifying interests	Possibility of significant effects (alone) in view of the conservation objectives of the site*	
Site 1	Impacts	Effects
<p>Clogher Head SAC</p> <p>c.7km to east of site</p> <p>Site Code: 001459</p> <p>Qis: 1230 Vegetated sea cliffs of the Atlantic and Baltic coasts M 4030 European dry heaths M</p>	<p>Construction: Ground clearance and release of silt laden water into watercourses reaching European Site. Hydrocarbon spillage.</p> <p>Operation: Ammonia emissions and nitrogen absorption/deposition at European Site.</p>	<p>Changes in key indicators of conservation status value (water quality etc.)</p> <p>Excessive nutrient enrichment and interference with ecological relationships and structure/function of site.</p>
	<p>Likelihood of significant effects from proposed development (alone):</p> <p>No hydrological connection therefore effect from construction impact ruled out. However, likelihood of significant effects from potential impact from ammonia emissions at operation stage cannot be ruled out.</p>	
	<p>If No, is there likelihood of significant effects occurring in combination with other plans or projects?</p>	
Site name Qualifying interests	Possibility of significant effects (alone) in view of the conservation objectives of the site*	
Site 2	Impacts	Effects
<p>Boyne Coast and Estuary SAC</p> <p>c.7.5km to south east of site</p> <p>Site Code: 001957</p> <p>Qis: 1130 Estuaries M 1140 Mudflats and sandflats not covered by seawater at low tide M 1310 Salicornia and other annuals colonizing mud and sand R</p>	<p>Construction: Ground clearance and release of silt laden water into watercourses reaching European Site. Hydrocarbon spillage.</p> <p>Operation: Ammonia emissions and nitrogen absorption/deposition at European Site.</p>	<p>Changes in key indicators of conservation status value (water quality etc.)</p> <p>Excessive nutrient enrichment and interference with ecological relationships and structure/function of site.</p>

<p>1330 Atlantic salt meadows (Glauco-Puccinellietalia maritimae) M 1410 Mediterranean salt meadows (Juncetalia maritimi) (under review) 2110 Embryonic shifting dunes R 2120 Shifting dunes along the shoreline with Ammophila arenaria ('white dunes') R 2130 *Fixed coastal dunes with herbaceous vegetation ('grey dunes') R</p>		
	<p>Likelihood of significant effects from proposed development (alone):</p> <p>Yes No hydrological connection therefore effect from construction impact ruled out. However, likelihood of significant effects from potential impact from ammonia emissions at operation stage cannot be ruled out.</p>	
	<p>If No, is there likelihood of significant effects occurring in combination with other plans or projects?</p>	
<p>Site name Qualifying interests</p>	<p>Possibility of significant effects (alone) in view of the conservation objectives of the site*</p>	
<p>Site 3:</p>	<p>Impacts</p>	<p>Effects</p>
<p>Dundalk Bay SAC c. 8km to north of site Site Code: 0004555</p> <p>QIs: 1130 Estuaries M 1140 Mudflats and sandflats not covered by seawater at low tide M 1220 Perennial vegetation of stony banks M 1310 Salicornia and other annuals colonizing mud and sand R 1330 Atlantic salt meadows (Glauco-Puccinellietalia maritimae) M</p>	<p>Construction: Ground clearance and release of silt laden water into watercourses reaching European Site. Hydrocarbon spillage.</p> <p>Operation: Ammonia emissions and nitrogen absorption/deposition at European Site.</p>	<p>Changes in key indicators of conservation status value (water quality etc.)</p> <p>Excessive nutrient enrichment and interference with ecological relationships and structure/function of site.</p>

1410 Mediterranean salt meadows (<i>Juncetalia maritimi</i>) M		
	<p>Likelihood of significant effects from proposed development (alone):</p> <p>Yes No hydrological connection therefore effect from construction impact ruled out. However, likelihood of significant effects from potential impact from ammonia emissions at operation stage cannot be ruled out.</p>	
	<p>If No, is there likelihood of significant effects occurring in combination with other plans or projects?</p>	
<p>Site name Qualifying interests</p>	<p>Possibility of significant effects (alone) in view of the conservation objectives of the site*</p>	
<p>Site 4:</p>	<p>Impacts</p>	<p>Effects</p>
<p>North-West Irish Sea SPA c.4.6km to east of site Site code: 004236 QIs: A001 Red-throated Diver <i>Gavia stellata</i> M A003 Great Northern Diver <i>Gavia immer</i> M A009 Fulmar <i>Fulmarus glacialis</i> R A013 Manx Shearwater <i>Puffinus puffinus</i> M A017 Cormorant <i>Phalacrocorax carbo</i> R A018 Shag <i>Phalacrocorax aristotelis</i> R A065 Common Scoter <i>Melanitta nigra</i> M A179 Black-headed Gull <i>Chroicocephalus ridibundus</i> M A182 Common Gull <i>Larus canus</i> M A183 Lesser Black-backed Gull <i>Larus fuscus</i> M A184 Herring Gull <i>Larus argentatus</i> R A187 Great Black-backed Gull <i>Larus marinus</i> M</p>	<p>Construction: Ground clearance and release of silt laden water into watercourses reaching European Site. Hydrocarbon spillage.</p> <p>Operation: Ammonia emissions and nitrogen absorption/deposition at European Site.</p>	<p>Changes in key indicators of conservation status value (water quality etc.)</p> <p>Excessive nutrient enrichment and interference with ecological relationships and structure/function of site.</p>

<p>A188 Kittiwake Rissa tridactyla R A192 Roseate Tern Sterna dougallii M A193 Common Tern Sterna hirundo M A194 Arctic Tern Sterna paradisaea M A195 Little Tern Sterna albifrons M A199 Guillemot Uria aalge A200 Razorbill Alca torda M A204 Puffin Fratercula arctica R A862 Little Gull Hydrocoloeus minutus M</p>		
	<p>Likelihood of significant effects from proposed development (alone):</p> <p>Yes</p> <p>I consider that effects from construction can be ruled out; although there is an indirect link, it is weak - the distance from the site to connecting water course, the flow distance of >4km in the watercourse and the receiving features connected to the SPA make it highly unlikely that the construction stage of the proposed development could generate impacts of a magnitude that could affect habitat quality.</p> <p>I note however that the NIS submitted by the applicant within the screening section concludes that mitigation is required to obviate significant effects. Likelihood of significant effects from potential impact from ammonia emissions therefore requires further assessment.</p>	
	<p>If No, is there likelihood of significant effects occurring in combination with other plans or projects?</p>	
<p>Site: 5</p>	<p>Impacts</p>	<p>Effects</p>
<p>Dundalk Bay SPA c. 8km to north of site Site Code: 004026 QIs: A005 Great Crested Grebe Podiceps cristatus wintering M A043 Greylag Goose Anser anser wintering M</p>	<p>Construction: Ground clearance and release of silt laden water into watercourses reaching European Site. Hydrocarbon spillage.</p> <p>Operation: Ammonia emissions and nitrogen absorption/deposition at European Site.</p>	<p>Changes in key indicators of conservation status value (water quality etc.)</p> <p>Excessive nutrient enrichment and interference with ecological relationships and structure/function of site</p>

A046 Light-bellied Brent
 Goose *Branta bernicla*
hrota wintering **M**
 A048 Shelduck *Tadorna*
tadorna wintering **M**
 A052 Teal *Anas*
crecca wintering **M**
 A053 Mallard *Anas*
platyrhynchos wintering
 A054 Pintail *Anas*
acuta wintering **M**
 A065 Common
 Scoter *Melanitta* **M**
nigra wintering A069 Red-
 breasted
 Merganser *Mergus*
serrator wintering **M**
 A130
 Oystercatcher *Haematopus*
ostralegus wintering **M**
 A137 Ringed
 Plover *Charadrius*
hiaticula wintering **M**
 A140 Golden
 Plover *Pluvialis*
apricaria wintering **M**
 A141 Grey Plover *Pluvialis*
squatarola wintering **M**
 A142 Lapwing *Vanellus*
vanellus wintering **M**
 A143 Knot *Calidris*
canutus wintering **M**
 A149 Dunlin *Calidris*
alpina wintering **M**
 A156 Black-tailed
 Godwit *Limosa* **M**
limosa wintering A157
 Bar-tailed Godwit *Limosa*
lapponica wintering **M**
 A160 Curlew *Numenius*
arquata wintering **M**
 A162 Redshank *Tringa*
totanus wintering **M**
 A179 Black-headed
 Gull *Chroicocephalus*
ridibundus wintering **M**
 A182 Common Gull *Larus*
canus wintering **M**
 A184 Herring Gull *Larus*
argentatus wintering **M**

A999 Wetlands & Waterbirds M		
	<p>Likelihood of significant effects from proposed development (alone):</p> <p>Yes No hydrological connection therefore effect from construction impact ruled out.</p> <p>Likelihood of significant effects from potential impact from ammonia emissions cannot be ruled out. Precautionary approach given AQIA concludes that the impact of ammonia will not extend beyond 7.5km from the site</p>	
	<p>If No, is there likelihood of significant effects occurring in combination with other plans or projects?</p>	
<p>Step 4 Conclude if the proposed development could result in likely significant effects on a European site</p>		
<p>It is not possible to exclude the possibility that the proposed development alone would result in significant effects on Clogher Head SAC, Boyne Coast and Estuary SAC, Dundalk Bay SAC, North-West Irish Sea SPA and Dundalk Bay SPA, from effects associated with ammonia emissions and nitrogen deposition at operation stage, causing excessive nutrient enrichment and interference with ecological relationships and structure/function of these sites and from effects from construction on water quality at North-West Irish Sea SPA</p> <p>As likelihood of significant effects cannot be ruled out without extensive investigation, an appropriate assessment is required on the basis of the possible effects of the project 'alone'.</p> <p>Further assessment in-combination with other plans and projects is not required at screening stage.</p>		

Appendix 2: Appropriate Assessment

Appropriate Assessment

The requirements of Article 6(3) as related to appropriate assessment of a project under part XAB, sections 177V of the Planning and Development Act 2000 (as amended) are considered fully in this section.

Taking account of the preceding screening determination, the following is an appropriate assessment of the implications of the proposed development of a poultry house, manure store and associated works in view of the relevant conservation objectives Clogher Head SAC, Boyne Coast and Estuary SAC, Dundalk Bay SAC, North-West Irish Sea SPA and Dundalk Bay SPA based on scientific information provided by the applicant.

The information relied upon includes the following:

- Natura Impact Statement prepared by Whitehill Environmental on behalf of the applicant
- Air Quality Impact Assessment (AQIA) prepared by Irwin Carr Consulting on behalf of the applicant
- EPA Licence Application Instruction Note 1 (IN1) Assessing the Impact of Ammonia Emissions and Nitrogen Deposition from Intensive Agriculture Installations on European Sites
- SCAIL and APIS outputs, as referenced in the above IN1.

I am not satisfied that the information provided is adequate to allow for Appropriate Assessment. I note that the NIS does not consider specific COs of the QIs in detail, just overall objectives to maintain the favourable conservation condition.

I am satisfied mitigation measures designed to avoid or reduce any adverse effects on site integrity are included and assessed for effectiveness.

Submissions/observations:

An Taisce (submission on planning application):

Cumulative and transboundary effects of ammonia must be assessed

Peter Sweetman/Wild Irish Defence (observation on appeal):

States no NIS was submitted with the application. States the Planning Authority did not carry out an Appropriate Assessment. Sets out the Commission's legal responsibilities under three areas of legislation including under the Habitats Directive. Based on the lack of

certainty in the information submitted it is not possible for the Commission to make decision to grant permission.

Clogher Head SAC (001459)

Summary of Key issues that could give rise to adverse effects (from screening stage):
 Ammonia emissions and nitrogen deposition
 See NIS Section 5.3

Qualifying Interest features likely to be affected	Conservation Objectives	Potential adverse effects	Mitigation measures (summary) NIS Section 6
1230 Vegetated sea cliffs of the Atlantic and Baltic coasts	To maintain the favourable conservation condition and attributes including habitat distribution and vegetation distribution and composition	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	No mitigation relating to ammonia emissions/nitrogen deposition. NIS states "Any other technologies to further reduce the emissions from the poultry installation should be considered where possible."
4030 European dry heaths	To maintain the favourable conservation condition and attributes including habitat distribution, soil nutrient levels, vegetation composition	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above

The above table is based on the documentation and information provided on the file and on the published NPWS Conservation Objectives (COs) and attributes/targets/measures for the Qualifying Interests (QIs) of the European site. The NIS submitted does not consider specific COs of the QIs in detail, just overall objectives to maintain the favourable conservation condition.

Assessment of issues that could give rise to adverse effects view of conservation objectives

(i) Ammonia emissions and nitrogen deposition.

Detailed atmospheric modelling of the proposed development was undertaken in accordance with the EPA Instruction Note on Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations, EPA 2021 (IN1). I note that this document has been superseded in 2024, and the flowchart and parameters which the nitrogen/ammonia assessment in the AQIA is based upon is different to the current document. I include the flowchart at the end of this AA report.

In accordance with IN1, Step 1 in the assessment is to determine if the background concentrations (BC) already exceed critical levels/loads for the ammonia or nitrogen at the Natura site. If not, the PC (process contribution (impact from the installation)) is then assessed.

Question 1

Nitrogen: The nitrogen background concentration (BC) at this site is not exceeded.

Ammonia: Background levels (BC) as per current SCAIL output (2.15 µg/m³) exceed Critical Level (1 µg/m³).

[Note on Ammonia Critical Level: The AQIA sets out Ammonia Critical Level values as 1-3 µg/m³. Section 3.6 of IN1 states that where Lichens and bryophytes (moss and liverworts) are integral to the sensitive receptor and/or are a qualifying interest for the site, apply a critical level of 1 µg/m³ and where lichens and bryophytes are not a qualifying interest for the site or integral to the sensitive receptor then apply a critical level of 3 µg/m³. As per the COs of the site, lichens and bryophytes are integral to the site. Therefore the Critical Level is 1 µg/m³.)

Note on SCAIL output.: Please note that these are current SCAIL outputs, and differ to the SCAIL outputs within the AQIA, which is dated August 2023. I have included SCAIL outputs I generated at the end of this AA report, along with some definitions from IN1 for ease of reference.]

Due to exceedance of ammonia BC, **Question 5** of IN1 is then followed. At this stage the modelling must take account of effects which might arise in-combination with other plans and projects in addition to the background concentration (BC) to obtain a worst-case Predicted Environmental Concentration (PEC). The PEC is described in IN1 as "All relevant PCs in combination plus the background at a receptor location". Question 5 asks "Is the PEC = [PC + Sum of PCs from other plans and projects + BC] less than the critical level of the European site?"

As per Table 19 of the AQIA, the modelled PC is 0.029µg/m³ based on the highest reading from 5 years modelling. (Note: This figure includes the existing and proposed houses. As permission for the existing poultry house was not granted until September 2019, I conclude that this baseline does not include the existing poultry house).

I calculate PEC as follows: Background Level + PC + PCS of other plans and projects = 2.15 + 0.029 = 2.179 µg/m³. The PEC exceeds the critical level. However, this is understandable as the BC already exceeded critical level.

Question 6 of IN1 requires that if the BC of ammonia levels or nitrogen deposition already exceeds the critical level or critical load at a European Site within the zone of influence of the installation, no additional emissions that represents a risk of an adverse effect on the integrity of the European Site can be authorised. It asks, are control measures available which demonstrate that there will be no adverse effect on the integrity the European Site(s) and demonstrate that there will be no damage to the qualifying interest(s) of the European Site(s).

The proposal does not include any control measures which demonstrate that there will be no adverse effect on the integrity the European Site or its qualifying interests. There are no mitigation measures proposed in relation to ammonia emissions. Therefore the requirement under IN1 is that the proposal be submitted “to EPA to consider extent of mitigation. Application only permitted if it is possible to demonstrate that the activity, in combination, will not have an adverse effect on the integrity of European site.”

The NIS is the mechanism for the applicant to assess any adverse effect on the integrity of European site, in terms of the specific impact of the proposed development on the European Site and its Qualifying Interests.

The NIS on page 32 repeats the conclusions of the AQIA. The AQIA states in relation to Clogher Head SAC on page 21:

It should be noted that the maximum PC of 2.9% at the SAC is based on the worst case process contribution over the 5-year period. It can be seen from Table 18 that the average impact of the sheds is 0.022 µg/m³ which represents a PC of approx. 2%.

The ammonia concentrations at the sites are dominated by the background concentrations, which are approximately 80 – 223% of the air quality guideline for ammonia.

At locations 14 and 15, where the Critical Level of ammonia is exceeded, the PC of the existing and proposed site is <4%, and as a result considered insignificant for the purposes of this assessment.

I acknowledge again that the AQIA and NIS refers to a 2021 version of IN1 in relying on same. However having regard to the 2024 version of IN1 and updated methodology I cannot conclude that there will not be an adverse effect on this European Site.

The conclusions in the NIS are made without any reference to the Qualifying Interests of the site.

The AQIA concludes on page 26

It is expected that the typical operation of the site will result in lower predicted ammonia and nitrogen impacts at the closest sensitive receptors than the worst case results presented in this report.

The predicted results of the ammonia modelling process show that the limits for the protection of vegetation are not exceeded at the designated habitats within the vicinity of the poultry farm. Thus, any areas of ecological interest will not be adversely affected from the ammonia emissions for the operation of the farm.

It is unclear what is meant by ‘vicinity’ here. However, the figures provided by the applicant have shown that show that the ammonia limits for the protection of vegetation (European Heath) are, in fact, exceeded at Clogher Head SAC albeit by existing Background Levels and I have confirmed this with current SCAIL output.

To summarise.

- Although this SAC is distant from the proposed development, the applicant has screened it in, being within 7.5km of the site. The Air Quality Impact Assessment (AQIA) establishes a zone of influence of not beyond 7.5km from the site (EIAR p 121, AQIA p 20, NIS p 30).

- EPA IN1 2021 (since updated) is relied upon by the applicant. EPA IN1 2024 states “Where background levels already exceed critical levels/loads at sensitive receptors within the zone of influence, detailed modelling of emissions, including in-combination effects, a Natura Impact Statement (NIS) and additional mitigation measures will be required.”
- To avoid confusion I wish to be clear that while IN 1 notes the following - *“Based on research, a nitrogen deposition level of ≤ 0.3 kgN/ha/annum is undetectable. This is considered in this screening process. If an IAI can demonstrate, using a screening model (with no mitigation measures considered), (see Section 3.8 below), that emissions from the site meet this criterion, in addition to the PC from the installation being ≤ 4 % of the critical level for ammonia and ≤ 5 % of the critical load for nitrogen deposition, then the European site may be screened out for AA.”*, the potential to screen out on this basis is only relevant to sites where background levels are not already exceeded (and other specific circumstances) as per IN1 p 10.
- The effect under consideration relates to Ammonia. The BC of Ammonia already exceeds Critical Level at Clogher Head SAC. (The BC of Nitrogen does not exceed Critical Load.) The effects of ammonia emissions from the development on the European Site require to be assessed.
- The AQIA models a contribution of ammonia at this SAC of up to $0.029 \mu\text{g}/\text{m}^3$. (I note that this is for both existing and proposed houses, and that emissions from the existing house would already be represented in SCAIL Background Concentration, therefore the impact from the proposed development is in fact less. It is not quantified in the AQIA or NIS)
- 4030 European dry heaths are a relevant Qualifying Interest (QI) of this SAC likely to be affected by ammonia emissions. The NIS submitted does not identify this QI as being particularly at risk of effects.
- For clarity, I wish to differentiate between ammonia and nitrogen and potential effects. The APIS tool referenced in IN1 allows potential impacts to be searched by habitat and impact mechanism. I note that this differentiates between impacts from ammonia and from nitrogen deposition. <https://www.apis.ac.uk/search-habitat-impacts>. While Dry European Heath is not listed, the nearest equivalent Dwarf Shrub Heath <https://www.apis.ac.uk/ammonia-dwarf-shrub-heath> sets out impacts from Ammonia e.g. being directly phytotoxic to vegetation, causing direct damage to species, e.g. bleaching and leaf discoloration etc.
- The NIS does not discuss or rule out potential adverse impacts from ammonia having regard to the Conservation Objectives, attributes and targets of European Dry Heaths along with the modelled concentration of ammonia from the proposed development.

In-combination effects

The AQIA considers the need for cumulative assessment on page 23. It states

In order to carry out a cumulative assessment it was necessary to identify any nearby installations that also have the potential to contribute a significant ammonia impact. There were no such sites in the vicinity of the sites and as such, a cumulative/ in-combination assessment is not required for this application.

EPA IN1 sets out on page Section 3.9 the criteria to use to determine the geographical range of the installations, to include in the in-combination assessment;
*All below threshold developments/activities within 5 km of the European Site,
All licensed developments/activities within 10 km of the European Site
A clear justification of what PCs from other plans and projects are included or excluded shall be provided by the applicant/licensee*

Having regard to the brief consideration of cumulative effects in the NIS I do not consider that the applicant has demonstrated satisfactorily that no significant effects will occur or that there is no potential for in-combination effects on Clogher Head SAC.

Findings and conclusions

The applicant concluded that the construction and operation of the proposed development alone, or in combination with other plans and projects, will not adversely affect the integrity of this European site.

Based on the information provided, I am not satisfied that adverse effects arising from aspects of the proposed development can be excluded for Clogher Head SAC. This is because the applicant, have identified the site as being within the zone of influence of the development, and having identified that the Critical Level of Ammonia is already exceed by Background Concentration at the site, did not consider the impact of the modelled concentration of ammonia emissions from the development, on specific QIs of the site and their Conservation Objectives.

Reasonable scientific doubt

I am not satisfied that no reasonable scientific doubt remains as to the absence of adverse effects.

Site Integrity

I am not satisfied that the proposed development will not affect the attainment of the Conservation Objectives of the Clogher Head SAC. Adverse effects on site integrity cannot be excluded and reasonable scientific doubt remains as to the absence of such effects.

Boyne Coast and Estuary SAC (001957)

Summary of Key issues that could give rise to adverse effects (from screening stage):

Ammonia emissions and nitrogen deposition
See NIS Section 5.3

Qualifying Interest features likely to be affected	Conservation Objectives	Potential adverse effects	Mitigation measures (summary) NIS Section 6
1310 Salicornia and other annuals colonizing mud and sand	To restore the favourable conservation condition and attributes including habitat area and distribution and vegetation distribution and composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	No mitigation relating to ammonia emissions/nitrogen deposition. NIS states "Any other technologies to further reduce the emissions from the poultry installation should be considered where possible."
1330 Atlantic salt meadows (Glauco-Puccinellietalia maritimae)	To maintain the favourable conservation condition and attributes including vegetation composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above
1410 Mediterranean salt meadows (Juncetalia maritimi)	No site specific objective and targets set	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above
2110 Embryonic shifting dunes	To restore the favourable conservation condition and attributes including habitat area and distribution and vegetation distribution and composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above
2120 Shifting dunes along the shoreline with Ammophila arenaria ('white dunes')	To restore the favourable conservation condition and attributes including vegetation structure and composition	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above

2130 Fixed coastal dunes with herbaceous vegetation ('grey dunes')	To restore the favourable conservation condition and attributes including vegetation structure and composition	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above
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The above table is based on the documentation and information provided on the file and on the published NPWS Conservation Objectives (COs) and attributes/targets/measures for the Qualifying Interests (QIs) of the European site. The NIS submitted does not consider specific COs of the QIs in detail, just overall objectives to maintain/restore the favourable conservation condition.

(i) Ammonia emissions and nitrogen deposition.

Detailed atmospheric modelling of the proposed development was undertaken in accordance with the EPA Instruction Note on Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations, EPA 2021 (IN1). I note that this document has been superseded in 2024, and the flowchart and parameters which the nitrogen/ammonia assessment in the AQIA is based upon is different to the current document. I include the flowchart at the end of this AA report.

In accordance with IN1, Step 1 in the assessment is to determine if the background concentrations (BC) already exceed critical levels/loads for the ammonia or nitrogen at the Natura site. If not, the PC (process contribution (impact from the installation)) is then assessed. This is done using modelled outputs, from 5 years of real weather inputs (2015-2019) of the PC, within the AQIA. The highest modelled PC is used.

Question 1

The nitrogen background concentration (BC) at this site is not exceeded. The AQIA sets out Ammonia Critical Limit values as 1-3 µg/m³. Section 3.6 of IN1 states that where Lichens and bryophytes (moss and liverworts) are integral to the sensitive receptor and/or are a qualifying interest for the site, apply a critical level of 1 µg/m³ and where lichens and bryophytes are not a qualifying interest for the site or integral to the sensitive receptor then apply a critical level of 3 µg/m³. As per the COs of the site lichens and bryophytes are not integral to the site. Therefore the Critical Limit is 3 µg/m³. Background levels as per SCAIL (2.19 µg/m³) do not exceed Critical Load.

Please note that these are current SCAIL outputs, and differ to the SCAIL outputs within the AQIA, which is dated August 2023. I have included SCAIL outputs I generated at the end of this AA report).

Question 2 requires assessment of 2 matters:

Is the impact from the installation (PC), at all Natura sites within the zone of influence of my site, ≤0.3 kgN/ha/annum for nitrogen deposition?

Is the PC from the intensive agriculture unit ≤ 4 % of the critical level for ammonia and ≤ 5 % of the critical load for nitrogen deposition at all Natura sites within the zone of influence of my site?

I note Appendix C of the AQIA and the mapped ammonia plume showing the annual average ammonia impact in the vicinity of the site, and the extent of the 0.058µg/µm³ contour line, (0.3kg.N/ha/yr). i.e. the area that nitrogen deposition that is considered 'significant' which is at least 4km northwest of the nearest point of the SAC.
 I note the PC is ≤ 4 % of the critical level for ammonia and ≤ 5 % of the critical load for nitrogen deposition.

I therefore conclude that the impact from ammonia emissions and nitrogen deposition does not require further assessment and no mitigation measures are necessary.

In-combination effects

In view of the site's Conservation Objectives and absence of likely significant effects I am satisfied that the proposed development would have no likely significant effect in combination with other plans and projects on the SAC.

Findings and conclusions

I am satisfied that adverse effects arising from aspects of the proposed development can be excluded for the Boyne Coast and Estuary SAC. Mitigation measures are not required.

Reasonable scientific doubt

I am satisfied that no reasonable scientific doubt remains as to the absence of adverse effects.

Site Integrity

The proposed development will not affect the attainment of the Conservation Objectives of the Boyne Coast and Estuary SAC. Adverse effects on site integrity can be excluded and no reasonable scientific doubt remains as to the absence of such effects.

Dundalk Bay SAC (004555)

Summary of Key issues that could give rise to adverse effects (from screening stage):

Ammonia emissions and nitrogen deposition
 See NIS Section 5.3

Qualifying Interest features likely to be affected	Conservation Objectives	Potential adverse effects	Mitigation measures (summary)
1220 Perennial vegetation of stony banks	To maintain the favourable conservation condition and attributes including habitat distribution and distribution and vegetation distribution and composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	No mitigation relating to ammonia emissions/nitrogen deposition. NIS states "Any other technologies to further reduce the emissions from the poultry installation should be considered where possible."

1310 Salicornia and other annuals colonizing mud and sand	To restore the favourable conservation condition and attributes including habitat area and distribution and vegetation distribution and composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above
1330 Atlantic salt meadows (Glaucopuccinellietalia maritimae)	To maintain the favourable conservation condition and attributes including vegetation composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above
1410 Mediterranean salt meadows (Juncetalia maritimi)	To maintain the favourable conservation condition and attributes including habitat area and distribution and vegetation distribution and composition.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	As above

The above table is based on the documentation and information provided on the file and on the published NPWS Conservation Objectives (COs) and attributes/targets/measures for the Qualifying Interests (QIs) of the European site. The NIS submitted does not consider specific COs of the QIs in detail, just overall objectives to maintain/restore the favourable conservation condition.

Assessment of issues that could give rise to adverse effects view of conservation objectives

(i) Ammonia emissions and nitrogen deposition.

Detailed atmospheric modelling of the proposed development was undertaken in accordance with the EPA Instruction Note on Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations, EPA 2021 (IN1). I note that this document has been superseded in 2024, and the flowchart and parameters which the nitrogen/ammonia assessment in the AQIA is based upon is different to the current document. I include the flowchart at the end of this AA report.

In accordance with IN1, Step 1 in the assessment is to determine if the background concentrations (BC) already exceed critical levels/loads for the ammonia or nitrogen at the Natura site. If not, the PC (process contribution (impact from the installation)) is then

assessed. This is done using modelled outputs, from 5 years of real weather inputs (2015-2019) of the PC, within the AQIA. The highest modelled PC is used.

Question 1:

The NIS with reference to the AQIA sets out on page 30 Table 3 that the background levels do not exceed critical load in Dundalk Bay SAC for ammonia. I have confirmed this is the case, based on current background levels from SCAIL. Please note that these are current SCAIL outputs, and differ to the SCAIL outputs within the AQIA, which is dated August 2023. I have included SCAIL outputs I generated at the end of this AA report).

The NIS in Table 5 sets out Nitrogen concentrations with reference to the AQIA AERMOD modelling. The tables shows that the background values given for Dundalk Bay SAC at 15.79 kg/N/ha/yr exceeding the guideline critical load of 10 kg/N/ha/yr stated.

I note that Table 5 of the NIS differs to Table 22 of the AQIA on page 24 of that document, in terms of the background values given for each site. Table 22 gives a background level of 6.63 kg/N/ha/yr for Dundalk Bay SAC. This is a significant difference. As the NIS relies on the AQIA modelling and Table 5 of the NIS states values are taken from Table 22 of the AQIA, it is reasonable to conclude that this is an error. Greater reliance is therefore placed on the AQIA values.

The location for source of background nitrogen deposition rates is not stated explicitly in the AQIA or NIS. I have attempted using SCAIL to verify the background nitrogen levels for either Table 22 of the AQIA or Table 5 of the NIS however I could not generate corroborating levels for either using the co-ordinates in Table 16 of the AQIA. Screen shots of the SCAIL input and output data or SCAIL input and output files are not included with the AQIA/NIS.

I have applied the SCAIL tool at the nearest point of the SAC and identifies background nitrogen deposition levels of 6.98 kg/N/ha/yr, broadly similar to that in the AQIA.(Screenshots of output at end of this document). Therefore I conclude that the background levels do not exceed critical load in Dundalk Bay SAC for nitrogen deposition.

Question 2 requires assessment of 2 matters:

Is the impact from the installation (PC), at all Natura sites within the zone of influence of my site, ≤ 0.3 kgN/ha/annum for nitrogen deposition?

Is the PC from the intensive agriculture unit ≤ 4 % of the critical level for ammonia and ≤ 5 % of the critical load for nitrogen deposition at all Natura sites within the zone of influence of my site?

I note Appendix C of the AQIA and the mapped ammonia plume showing the annual average ammonia impact in the vicinity of the site, and the extent of the $0.058\mu\text{g}/\mu\text{m}^3$ contour line, (0.3kg.N/ha/yr). i.e. the area that nitrogen deposition that is considered 'significant' which is at least 3.5km south of the nearest point of the SAC.

I note the PC is ≤ 4 % of the critical level for ammonia and ≤ 5 % of the critical load for nitrogen deposition.

I therefore conclude that the impact from ammonia emissions and nitrogen deposition does not require further assessment and no mitigation measures are necessary.

In-combination effects

In view of the site's Conservation Objectives and absence of likely significant effects I am satisfied that the proposed development would have no likely significant effect in combination with other plans and projects on the SAC.

Findings and conclusions

I am satisfied that adverse effects arising from aspects of the proposed development can be excluded for the Dundalk Bay SAC. Mitigation measures are not required.

Reasonable scientific doubt

I am satisfied that no reasonable scientific doubt remains as to the absence of adverse effects.

Site Integrity

The proposed development will not affect the attainment of the Conservation Objectives of the Dundalk Bay SAC. Adverse effects on site integrity can be excluded and no reasonable scientific doubt remains as to the absence of such effects.

Dundalk Bay SPA (004026)

Summary of Key issues that could give rise to adverse effects (from screening stage):

Ammonia emissions and nitrogen deposition.
See NIS Section 5.3

Qualifying Interest features likely to be affected	Conservation Objectives	Potential adverse effects	Mitigation measures (summary)
Wintering birds as follows: A005 Great Crested Grebe, A043 Greylag Goose, A046 Light-bellied Brent Goose, A048 Shelduck, A052 Teal Anas, A053 Mallard Anas platyrhynchos, A054 Pintail, A065 Common Scoter, A069 Red-breasted Merganser,	Each QI has the conservation objectives to maintain the favourable conservation condition based on attributes of population trend and distribution.	Potential adverse effects on population and distribution would relate to impact on habitat in terms of water quality and vegetation – these are covered by under the QI below.	NIS Section 6 See below

A130 Oystercatcher, A137 Ringed Plover, A140 Golden Plover, A141 Grey Plover, A142 Lapwing Vanellus, A143 Knot Calidris, A149 Dunlin Calidris, A156 Black-tailed Godwit, A157 Bar-tailed Godwit, A160 Curlew, A162 Redshank, A179 Black- headed Gull, A182 Common Gull, A184 Herring Gull			
A999 Wetlands and waterbirds	To maintain the favourable conservation condition of the wetland habitat for migratory water birds based on the attribute of habitat area.	Ammonia emissions and nitrogen deposition affecting nutrient balance and health, extent and variety of vegetation.	No mitigation relating to ammonia emissions/nitrogen deposition. NIS states “Any other technologies to further reduce the emissions from the poultry installation should be considered where possible.”
The above table is based on the documentation and information provided on the file and on the published NPWS Conservation Objectives (COs) and attributes/targets/measures for the Qualifying Interests (QIs) of the European site. The NIS submitted does not consider specific COs of the QIs in detail, just overall objectives to maintain/restore the favourable conservation condition.			
<p>Assessment of issues that could give rise to adverse effects view of conservation objectives</p> <p>(i) Ammonia emissions and nitrogen deposition. Detailed atmospheric modelling of the proposed development was undertaken in accordance with the EPA Instruction Note on Assessment of the Impact of Ammonia and Nitrogen on Natura 2000 sites from Intensive Agriculture Installations, EPA 2021 (IN1). I note that this document has been superseded in 2024, and the flowchart and parameters</p>			

which the nitrogen/ammonia assessment in the AQIA is based upon is different to the current document. I include the flowchart at the end of this AA report.

In accordance with IN1, Step 1 in the assessment is to determine if the background concentrations (BC) already exceed critical levels/loads for the ammonia or nitrogen at the Natura site. If not, the PC (process contribution (impact from the installation)) is then assessed. This is done using modelled outputs, from 5 years of real weather inputs (2015-2019) of the PC, within the AQIA. The highest modelled PC is used.

I conclude that the background levels are not already exceeded for the ammonia critical level or nitrogen critical load at this Natura site (Step 1 of the EPA Guidance). The SPA is at least 3.5km from any impact from the proposed development of >0.3 kgN/ha/annum for nitrogen deposition. The PC is ≤ 4 % of the critical level for ammonia and ≤ 5 % of the critical load for nitrogen deposition.

I therefore conclude that the impact from ammonia emissions and nitrogen deposition does not require further assessment and no mitigation measures are necessary.

In-combination effects

In view of the site’s Conservation Objectives and absence of likely significant effects I am satisfied that the proposed development would have no likely significant effect in combination with other plans and projects on the SAC.

Findings and conclusions

I am satisfied that adverse effects arising from aspects of the proposed development can be excluded for the Dundalk Bay SPA. Mitigation measures are not required.

Reasonable scientific doubt

I am satisfied that no reasonable scientific doubt remains as to the absence of adverse effects.

Site Integrity

The proposed development will not affect the attainment of the Conservation Objectives of the Dundalk Bay SPA. Adverse effects on site integrity can be excluded and no reasonable scientific doubt remains as to the absence of such effects.

North-West Irish Sea SPA: (004236)

Summary of Key issues that could give rise to adverse effects (from screening stage):

Construction impacts – Emissions of silt laden water/hydrocarbons into watercourses reaching SPA

Ammonia emissions and nitrogen deposition.

See NIS Section 5.2 and 5.3

Qualifying Interest features likely to be affected	Conservation Objectives	Potential adverse effects	Mitigation measures (summary)
			NIS Section 6

<p>QIs: A001 Red-throated Diver A003 Great Northern Diver A013 Manx Shearwater A065 Common Scoter A179 Black-headed Gull A182 Common Gull A183 Lesser Black-backed Gull A187 Great Black-backed Gull A192 Roseate Tern A193 Common Tern A194 Arctic Tern A195 Little Tern A199 Guillemot A200 Razorbill A862 Little Gull</p>	<p>Each QI has the conservation objectives to maintain the favourable conservation condition based on attributes of non-breeding population size, spatial distribution, forage spatial distribution, disturbance across the site and barriers to connectivity and site use.</p>	<p>1. Ground clearance and release of silt laden water into watercourses reaching SPA. Hydrocarbon spillage.</p> <p>2. Ammonia emissions and nitrogen deposition</p>	<p>Best practice construction management including - controls of erosion, sediment generation and other pollutants - control /management of hydrocarbons - concrete/aggregate management measures - waste management</p> <p>Compliance with Dept of Ag requirements</p> <p>Retention of vegetation and any removal outside of nesting season</p> <p>Low night time lighting.</p> <p>Appropriate landscaping</p> <p>Compliance with S.I. 113 of 2022 (GAP Regulations)</p> <p>No mitigation relating to ammonia emissions/nitrogen deposition. NIS states “Any other technologies to further reduce the emissions from the poultry installation should be considered where possible.”</p>
<p>A009 Fulmar A017 Cormorant A018 Shag A184 Herring Gull A188 Kittiwake A204 Puffin</p>	<p>Each QI has the conservation objectives to restore the favourable conservation condition based on attributes of non-breeding population size, spatial distribution, forage</p>	<p>As above</p>	<p>As above</p>

	spatial distribution, disturbance across the site and barriers to connectivity and site use.		
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The above table is based on the documentation and information provided on the file and on the published NPWS Conservation Objectives (COs) and attributes/targets/measures for the Qualifying Interests (QIs) of the European site. The NIS submitted does not consider specific COs of the QIs in detail, just overall objectives to maintain/restore the favourable conservation condition.

Assessment of issues that could give rise to adverse effects view of conservation objectives

(i) Water quality degradation.

Ground clearance during construction and release of silt laden water into watercourses, or hydrocarbon spillages could reach the SPA and affect water quality and aquatic species.

Mitigation proposed is detailed in section 6 of the NIS and includes general construction best practice measures. I note in particular that a geotextile membrane silt fence is recommended, along with an interceptor trench. The silt fence must be capable of preventing particles of 425µm from passing through. Page 36 sets out control and management of hydrocarbons and page 37 sets out concrete/aggregate management measures.

Having regard to the location of the proposed development and its physical nature, its distance from the European site and dilution present at point of discharge, and having regard to the Conservation Objectives of the site I am satisfied that the mitigation is adequate to conclude that there will not be adverse effects on the North West Irish Sea SPA or the integrity of the site.

(ii) Ammonia emission and nitrogen deposition

Again, potential impacts would not affect the COs related to population size, spatial distribution, forage spatial distribution etc. While it may potentially affect nutrient balance and extent/variety of vegetation, the SPA is not designated for wetland or other habitats or plant species. Impact from ammonia emissions and nitrogen deposition does not require further assessment.

Mitigation measures and conditions

None required.

In-combination effects

In view of the site's Conservation Objectives, I am satisfied that the proposed development would have no likely significant effect on the SPA in combination with other plans and projects.

Findings and conclusions

I am satisfied that adverse effects arising from aspects of the proposed development can be excluded for the North West Irish Sea SPA. Potential impacts would have no bearing on the Conservation Objectives of the site. Mitigation measures are not required.

Reasonable scientific doubt

I am satisfied that no reasonable scientific doubt remains as to the absence of adverse effects.

Site Integrity

The proposed development will not affect the attainment of the Conservation Objectives of the North West Irish Sea SPA. Adverse effects on site integrity can be excluded and no reasonable scientific doubt remains as to the absence of such effects.

Appropriate Assessment Conclusion: Integrity Test

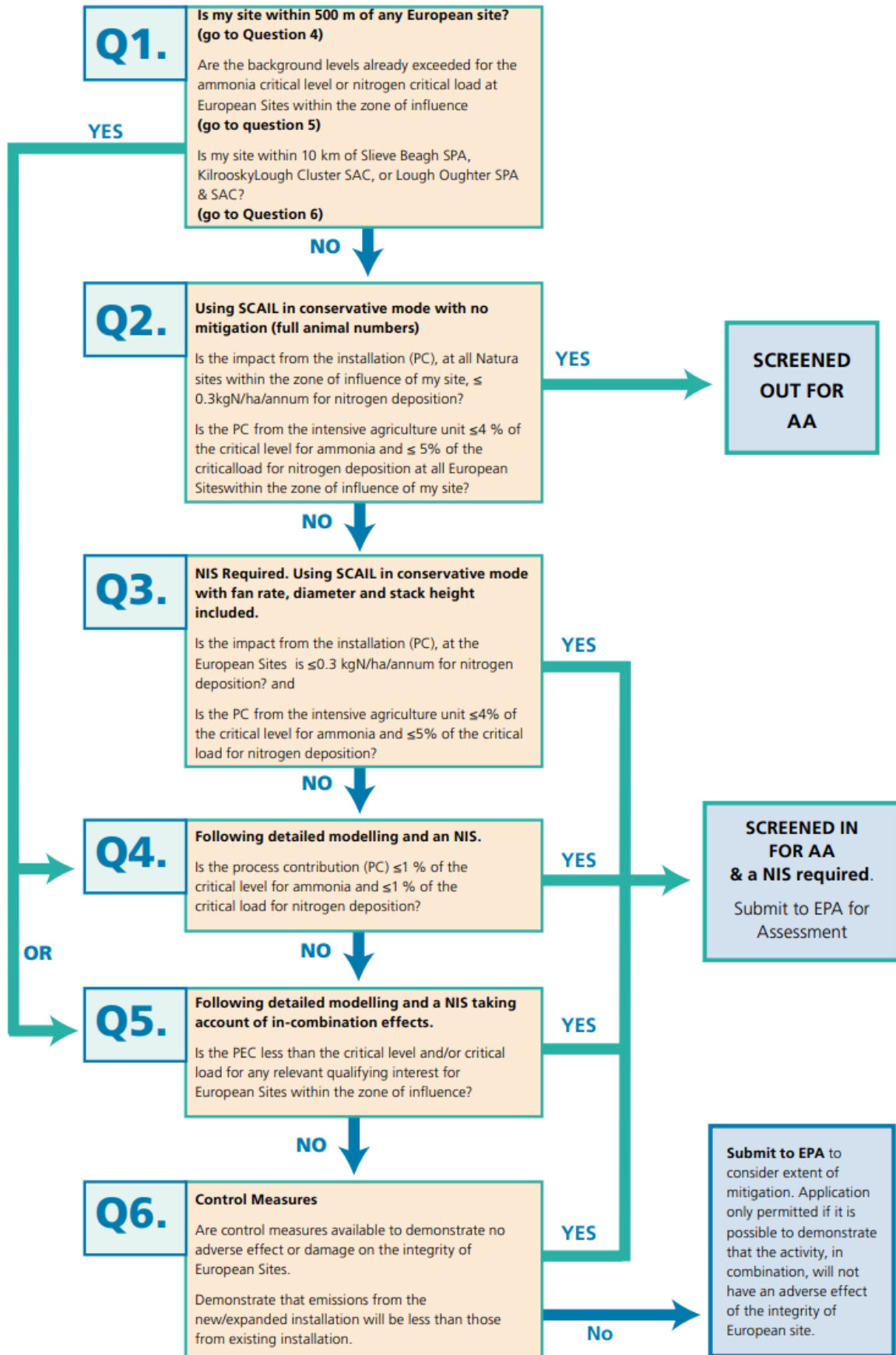
In screening the need for Appropriate Assessment, it was determined that the proposed development could result in significant effects on Clogher Head SAC, Boyne Coast and Estuary SAC, Dundalk Bay SAC, North-West Irish Sea SPA and Dundalk Bay SPA in view of the conservation objectives of those sites and that Appropriate Assessment under the provisions of S177V was required.

Following an examination, analysis and evaluation of the NIS all associated material submitted and taking into account observations/submissions, I consider that adverse effects on site integrity of the Clogher Head SAC cannot be excluded in view of the conservation objectives of this site and that reasonable scientific doubt remains as to the absence of such effects.

My conclusion is based on the following:

- The identification (within the NIS) of the SAC as being within the zone of influence of modelled ammonia emissions from the proposed development;
- Background concentration of ammonia already exceeding critical level of ammonia at the SAC and the results of modelling undertaken in the submitted Air Quality Impact Assessment;
- The provisions of EPA Licence Application Instruction Note 1 (IN1) Assessing the Impact of Ammonia Emissions and Nitrogen Deposition from Intensive Agriculture Installations on European Sites 2024;
- Deficiencies within the NIS, in particular failure to consider the impact of modelled ammonia emissions on the specific Conservation Objectives of the Qualifying Interests of European Dry Heaths within this European Site; and consequently
- The absence of any clear determination that there is no risk of an adverse effect on the integrity of the European Site from ammonia emissions from the proposed development.
- Inadequate details of consideration of in-combination effects on Clogher Head SAC.

APPENDIX 1. FLOWCHART



Definitions

Background concentration	Existing ambient levels/loads, including contributions from operational activities, developments etc.
Critical Level for ammonia (Cle) expressed as $\mu\text{g}/\text{m}^3$	Concentration of ammonia in the atmosphere above which direct adverse effects on receptors, such as plants and ecosystems may occur according to present knowledge.
Critical Load for nitrogen deposition (CLo) expressed as $\text{kg}/\text{ha}/\text{year}$	A quantitative estimate of exposure to nitrogen deposition below which significant harmful effects on specified sensitive elements of the environment do not occur according to present knowledge.
Process Contribution (PC)	Contribution of a substance from the installation to atmospheric levels/ deposition, modelled at a receptor location.
Predicted Environmental Contribution (PEC)	All relevant PCs in combination plus the background at a receptor location.

Current SCAIL background levels - ING grid co-ordinates from EIAR

Dundalk Bay SAC

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 310127,293062
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	0.00	
Background deposition to habitat		0.00
Critical Load / Level	1-3	-

Dundalk Bay SPA

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 310162,293043
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	0.00	
Background deposition to habitat		0.00
Critical Load / Level	1-3	-

Clogher Head SAC

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 316399,283546
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	0.00	
Background deposition to habitat		0.00
Critical Load / Level	1-3	-

Boyne Coast and Estuary SAC

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 315562,280342
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.19	
Background deposition to habitat		6.66
Critical Load / Level	1-3	-

North West Irish Sea SPA

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 314670,285494
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.34	
Background deposition to habitat		6.83
Critical Load / Level	1-3	-

Current SCAIL background levels- ING grid co-ordinates selected from map

Dundalk Bay SAC:

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 309807,292882
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.48	
Background deposition to habitat		6.98
Critical Load / Level	1-3	-

Dundalk Bay SPA:

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 309807,292882
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.48	
Background deposition to habitat		6.98
Critical Load / Level	1-3	-

Clogher Head SAC:

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 315510,283413
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.15	
Background deposition to habitat		6.95
Critical Load / Level	1-3	-

Boyne Coast and Estuary SAC

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 315562,280342
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.19	
Background deposition to habitat		6.66
Critical Load / Level	1-3	-

North West Irish Sea SPA:

Background Levels and Critical Loads

Region: Republic of Ireland
Gridreference: 314670,285494
Habitat: please select...

Concentrations/Depositions and Critical Loads	Conc NH3 (µg/m3)	N Dep. kg N/ha/yr
Background concentration to habitat	2.34	
Background deposition to habitat		6.83
Critical Load / Level	1-3	-

Extract from APIS in relation to Critical Level for Ammonia at Clogher Head SAC

critical loads of nitrogen for Europe. For Ireland values are derived from Aherne et al., 2021 - Nitrogen-Sulfur Critical Loads: Assessment of the Impacts of Air Pollution on Habitats (see Table 3.2). The UK Conservation Agencies and Regulators require the minimum value of the critical load range for the most sensitive habitat type present on the site to be used during the screening /Likely Significant Effect stages of air quality assessments. View the full statement on the application of modifying factors.

Nutrient Nitrogen Information Acidity Information

Where Critical Levels of ammonia are indicated as "1 or 3 ug/m3" the decision must be made on a site specific basis.

Habitats and species types including vascular and non-vascular plants, lichens and bryophytes and stoneworts

Show 5 entries Search:

Feature Code	Feature Name	Feature Layname	NVC types	Is the Feature sensitive to N?	Minimum Critical Load for N (kg N/ha/yr)	Maximum Critical Load for N (kg N/ha/yr)	Ammonia Critical Level (ug m-3)	NOx Critical Level (ug m-3)	SO2 Critical Level (ug m-3)	Nitrogen Critical Load Class	EUNIS code	Extra info on habitat N critical load	Are Bryophytes integral for this habitat?	Are Lichens integral for this habitat?
H4030	European dry heaths	Dry heaths	H2; H3; H4; H9; H11; H10; H12; H16; H18; H21; H7; H8	Yes	5	10	1	30	10	Dry heaths	F4.2	Use the high end of the range with high precipitation and the low end of the range with low precipit Show more	Yes	Yes
H1230	Vegetated sea cliffs of the Atlantic and Baltic Coasts	Vegetated sea cliffs	MC1; MC10; MC11; MC12; MC2; MC3; MC4; MC5; MC7; MC8; MC9; H7; H8d; MC6	Yes				30		No comparable habitat with established critical load estimate available		Vegetated sea cliffs can be a mosaic of habitat types from wetlands to woodland. However they are at Show more	No	No

Showing 1 to 2 of 2 entries Previous 1 Next

Other Species
No data available.

Appendix 3 Water Framework Directive Screening

WFD IMPACT ASSESSMENT STAGE 1: SCREENING			
Step 1: Nature of the Project, the Site and Locality			
An Bord Pleanála ref. no.	320010 - 24	Townland, address	Carrickbaggot Co. Louth
Description of project	Construction of poultry house and manure store with meal storage bins, soiled water tank, upgraded internal farm laneway, site drainage works (diversion of a drainage channel, two culvert upgrades and a swale/attenuation tank) and associated works		
Brief site description, relevant to WFD Screening	Site as outlined in red is 68.5 hectares (includes full farm area). Lands the subject of this development c. 1.5 hectares. The site is agricultural land, gently undulating. Surrounding land area is agricultural with low levels of one-off rural housing.		
Proposed surface water details	Stormwater drainage, following attenuation, to existing land-drains via petrol interceptor. A land drain is to be diverted to accommodate the development footprint.		
Proposed water supply source & available capacity	Ground water supply. Source and available capacity unclear. Wells apparent on site. Proposed wells and proposed connection to GWS referred to in application but not substantiated.		

Proposed wastewater treatment system & available capacity, other issues		No connections to public water supply or wastewater network. No staff welfare facilities (WCs etc.) proposed.				
Others?		Manure and soiled water to be collected, and stored/tanked respectively, for landspreading.				
Step 2: Identification of relevant water bodies and Step 3: S-P-R connection						
Identified water body	Distance to (m)	Water body name(s) (code)	WFD Status	Risk of not achieving WFD Objective e.g.at risk, review, not at risk	Identified pressures on that water body	Pathway linkage to water feature (e.g. surface run-off, drainage, groundwater)
river	c. 720m west c. 760 north	SLIEVEBOY_010 IE_NB_06S160790	Moderate	Review	None identified	Surface water discharge, following attenuation, via land drains.
groundwater	0m	Louth IEGBNI_NB_G_019	Good	Not at risk	None identified	Drainage/infiltration

Step 4: Detailed description of any component of the development or activity that may cause a risk of not achieving the WFD Objectives having regard to the S-P-R linkage.							
CONSTRUCTION PHASE							
No.	Component	Water body receptor (EPA Code)	Pathway (existing and new)	Potential for impact/ what is the possible impact	Screening Stage Mitigation Measure*	Residual Risk (yes/no) Detail	Determination** to proceed to Stage 2. Is there a risk to the water environment? (if 'screened' in or 'uncertain' proceed to Stage 2.
1.	Site clearance/ construction	SLIEVEBOY_010	Surface water network	Hydrocarbon spillages, silt entering SW network	Standard Construction Measures / Conditions	No	Screened out
2	Site clearance/ construction	IEGBNI_NB_G_019	Drainage/ infiltration	Hydrocarbon spillages	Standard Construction Measures / Conditions	No	Screened out
OPERATIONAL PHASE							
3.	Surface run-off	SLIEVEBOY_010	Surface water network	Contaminated run-off entering surface water network, e.g. hydrocarbons form vehicles	Standard operational measures e.g. petrol interceptor/	No. May be a condition of planning	Screened out

					conditions		
4.	Surface run-off	SLIEVEBOY_010	Surface water network	Excess nitrates entering surface water network from landspreading on 2Ha within site.	GAP Regulations SI 113/2022 regulate landspreading activities	Unlikely if Regulation adhered to. Enforcement and regulation is EPA responsibility.	Screened out.
5	Discharges to Ground	IEGBNI_NB_G_019	Infiltration	Excess nitrates entering ground water network from landspreading on 2Ha within site. Note – infiltration potential is very poor	GAP Regulations SI 113/2022 regulate landspreading activities	Unlikely if Regulation adhered to. Enforcement and regulation is EPA responsibility.	Screened out.
DECOMMISSIONING PHASE							
6.	NA	NA	NA	NA	NA	NA	NA